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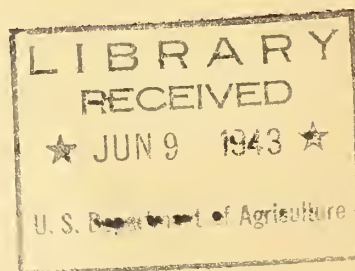
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UNITED STATES DEPARTMENT OF AGRICULTURE
Bureau of Agricultural Economics

LABOR REQUIREMENTS FOR CROPS AND LIVESTOCK

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Procedure and Acknowledgments

This report contains information on the average number of man hours used in an average season to produce an acre of each of some 90 crops; number of hours used in caring for various classes of livestock for a year; number of hours used in producing livestock products, such as a hundredweight of pork, beef, milk, and a hundred dozen of eggs; and data related to the labor requirements, such as average yields of crops, number of livestock on farms, production of livestock, and certain factors for converting livestock labor requirements from a live weight to a dressed weight basis, and for computing the number of man hours needed to harvest crops of various yields.

The labor requirements shown are State averages, arrived at by taking into consideration many variations from the average. They are not the result of any special survey, but were "built up" from available data collected by Federal and State agencies. The requirements were previously released in preliminary form for review purposes only. A few suggested changes have been incorporated in the estimates. Additional suggestions that will improve the data will be most welcome.

Included in the labor for crop production are the hours for hauling manure, plowing and fitting the land, planting and cultivating, spraying, dusting, pruning, etc., and for harvesting and hauling the crop to storage, local market, or processing plant. The hours for livestock care and production include direct labor only for such operations as feeding, caring for, and disposing of the animals and their products. Labor for growing feed and repairing buildings, fences, and equipment, is not included.

Several members of the staff helped to bring together the information on which these estimates are based.



LABOR REQUIREMENTS FOR CROPS AND LIVESTOCK

By M. R. Cooper, W. C. Holley, H. W. Hawthorne, and R. S. Washburn

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Manpower is a paramount need today. It must be distributed among urgent industries. These State averages of labor requirements of various agricultural commodities in an average season are made available for those who can use them in figuring the needs for labor, and in planning for its distribution.

BARLEY: Labor requirements per acre 1/

| State | Man hours per acre | | | 1929-38 average yield per acre |
|--------------------|--------------------|------------|---------|---|
| | Total | Preharvest | Harvest | |
| | Hours | Hours | Hours | |
| Maine | 26.0 | 12.5 | 13.5 | 29.3 |
| Vermont | 26.0 | 12.5 | 13.5 | 27.0 |
| New England | 26.0 | 12.5 | 13.5 | 28.0 |
| New York | 19.0 | 8.9 | 10.1 | 24.0 |
| New Jersey | 17.0 | 7.1 | 9.9 | 27.2 |
| Pennsylvania | 18.7 | 8.5 | 10.2 | 26.0 |
| Middle Atlantic | 18.8 | 8.7 | 10.1 | 25.0 |
| Ohio | 15.2 | 6.3 | 8.9 | 23.2 |
| Indiana | 14.0 | 6.0 | 8.0 | 20.2 |
| Illinois | 11.8 | 5.0 | 6.8 | 24.8 |
| Michigan | 15.9 | 7.2 | 8.7 | 22.4 |
| Wisconsin | 16.0 | 7.2 | 8.8 | 27.2 |
| East North Central | 15.3 | 6.8 | 8.5 | 25.7 |
| Minnesota | 10.5 | 4.2 | 6.3 | 21.6 |
| Iowa | 11.1 | 4.6 | 6.5 | 24.3 |
| Missouri | 15.0 | 7.7 | 7.3 | 17.5 |
| North Dakota | 7.5 | 3.5 | 4.0 | 14.0 |
| South Dakota | 7.5 | 3.5 | 4.0 | 15.3 |
| Nebraska | 6.5 | 3.0 | 3.5 | 17.6 |
| Kansas | 5.9 | 2.7 | 3.2 | 13.7 |
| West North Central | 8.3 | 3.6 | 4.7 | 17.7 |
| Maryland | 17.8 | 7.7 | 10.1 | 29.4 |
| Virginia | 21.6 | 9.8 | 11.8 | 25.0 |
| West Virginia | 22.5 | 10.5 | 12.0 | 24.6 |
| North Carolina | 21.5 | 10.4 | 11.1 | 18.1 |
| South Atlantic | 20.0 | 8.9 | 11.1 | 26.4 |
| Kentucky | 15.8 | 6.7 | 9.1 | 22.4 |
| Tennessee | 18.2 | 7.8 | 10.4 | 17.6 |
| East South Central | 17.1 | 7.3 | 9.8 | 19.9 |
| Oklahoma | 7.2 | 4.0 | 3.2 | 15.2 |
| Texas | 5.0 | 2.5 | 2.5 | 16.0 |
| West South Central | 6.5 | 3.5 | 3.0 | 15.5 |

- Continued -

BARLEY: Labor requirements per acre 1/ - Continued

| State | Man hours per acre | | | 1929-33 |
|---------------|--------------------|------------|---------|----------|
| | | | | average |
| | Total | Preharvest | Harvest | yield |
| | | | | per acre |
| | Hours | Hours | Hours | Bushels |
| Montana | 9.0 | 4.0 | 5.0 | 19.0 |
| Idaho | 11.0 | 5.0 | 6.0 | 33.8 |
| Wyoming | 11.8 | 4.8 | 7.0 | 21.2 |
| Colorado | 11.0 | 5.5 | 5.5 | 19.0 |
| New Mexico | 12.0 | 6.0 | 6.0 | 20.8 |
| Arizona | 13.5 | 6.5 | 7.0 | 30.4 |
| Utah | 14.0 | 7.0 | 7.0 | 37.6 |
| Nevada | 15.0 | 8.0 | 7.0 | 37.2 |
| Mountain | 11.0 | 5.3 | 5.7 | 22.9 |
| Washington | 9.0 | 4.0 | 5.0 | 31.6 |
| Oregon | 9.5 | 4.5 | 5.0 | 29.0 |
| California | 9.8 | 4.5 | 5.3 | 26.7 |
| Pacific | 9.7 | 4.5 | 5.2 | 27.3 |
| United States | 9.6 | 4.2 | 5.4 | 20.2 |

1/ Barley harvested for grain. According to the 1940 census the following percentage of the total barley acreage in specified States was irrigated in 1939: Montana, 30 percent; Idaho, 45 percent; Wyoming, 71 percent; Colorado, 50 percent; New Mexico, 74 percent; Arizona, 98 percent; Utah, 91 percent; Nevada, 100 percent; Washington, 13 percent; Oregon, 29 percent; and California, 28 percent.

Machine and Labor Performance

The rate of combining barley is about the same as that for wheat. The performance of combines by size are shown in the wheat statement, page 18. Rates of performance in cutting and shocking barley and wheat are about the same, unless there is considerable difference in growth. Hauling to barn or stack, and threshing, frequently are somewhat higher for barley than for wheat because of additional barley growth and yield. Rates of work are shown in the wheat statement, page 18.

BUCKWHEAT: Labor requirements per acre 1/

| State | Man hours per acre | | | 1930-39 average yield per acre |
|-----------------|--------------------|------------|---------|---|
| | Total | Preharvest | Harvest | |
| | Hours | Hours | Hours | |
| Maine | 25.0 | 12.0 | 13.0 | 17.0 |
| Vermont | 25.5 | 12.0 | 13.5 | 20.5 |
| New England | 25.1 | 12.0 | 13.1 | 17.6 |
| New York | 20.0 | 8.7 | 11.3 | 17.2 |
| New Jersey | 18.0 | 6.8 | 11.2 | 19.6 |
| Pennsylvania | 20.0 | 8.4 | 11.6 | 17.6 |
| Middle Atlantic | 20.0 | 8.6 | 11.4 | 17.4 |
| Ohio | 17.5 | 7.5 | 10.0 | 16.6 |
| Indiana | 17.0 | 7.5 | 9.5 | 13.7 |
| Illinois | 16.0 | 7.0 | 9.0 | 14.6 |
| Michigan | 18.0 | 7.5 | 10.5 | 12.1 |
| Wisconsin | 18.0 | 8.0 | 10.0 | 11.1 |
| E. N. Central | 17.7 | 7.6 | 10.1 | 13.1 |
| Minnesota | 14.0 | 5.0 | 9.0 | 9.4 |
| Iowa | 14.0 | 6.0 | 8.0 | 12.6 |
| Missouri | 13.0 | 8.5 | 9.5 | 10.1 |
| North Dakota | 12.0 | 5.0 | 7.0 | 6.1 |
| South Dakota | 12.0 | 5.0 | 7.0 | 6.8 |
| W. N. Central | 14.0 | 5.3 | 8.7 | 9.6 |
| Delaware | 18.0 | 8.0 | 10.0 | 10.8 |
| Maryland | 21.0 | 8.5 | 12.5 | 19.2 |
| Virginia | 23.0 | 10.0 | 13.0 | 12.8 |
| West Virginia | 24.0 | 10.0 | 14.0 | 16.9 |
| North Carolina | 24.0 | 10.5 | 13.5 | 14.1 |
| South Atlantic | 23.1 | 9.8 | 13.3 | 15.3 |
| Kentucky | 22.0 | 10.0 | 12.0 | 9.8 |
| Tennessee | 22.5 | 10.0 | 12.5 | 12.0 |
| E. S. Central | 22.3 | 10.0 | 12.3 | 11.0 |
| United States | 19.8 | 8.5 | 11.3 | 16.1 |

1/ Buckwheat is grown in a cool moist climate, frequently on poor, rough, stony soils. Many of the acreages are small and not well suited to the use of large machines. A small percentage of the crop is combined, with an expenditure of 2 to 3 hours of labor per acre. Many small, rough patches are cut with a cradle, shocked, and threshed, either from shock, barn or stack. Harvesting in this manner requires 14 to 18 hours per acre. Most of the acreage, however, is cut with binder and threshed with a stationary outfit. This procedure requires 7 to 10 hours per acre for harvesting.

- Continued -

CORN: Labor requirements per acre 1/ - Continued

| State | Man hours per acre | | | | | | | 1930-39 | |
|----------------|--------------------|-------|----------|---------------|-------|-------|----------|---------|-------|
| | All field corn | | | Harvested for | | | | average | |
| | | | | Grain | | | | yield | |
| | Pre- | Har- | Cut, | From | | Other | per acre | | |
| | Total:harvest: | vest: | shocked, | standing: | Sil-- | pur-- | Grain | Silage | |
| | Hours | Hours | Hours | Hours | Hours | Hours | Hours | Bushels | Tons |
| Kentucky | 40.9 | 21.1 | 19.8 | 20.0 | - | 18.0 | 8.0 | 22.4 | 7.30 |
| Tennessee | 40.9 | 21.1 | 19.8 | 20.0 | - | 18.0 | 8.0 | 21.2 | 5.90 |
| Alabama | 40.2 | 30.8 | 9.4 | - | 9.5 | 10.0 | 5.0 | 12.4 | 2.93 |
| Mississippi | 43.0 | 33.1 | 9.9 | - | 10.0 | 15.0 | 5.0 | 14.5 | 4.84 |
| E.S.Central | 41.4 | 27.0 | 14.4 | 20.0 | 9.7 | 17.0 | 6.1 | 17.3 | 6.25 |
| Arkansas | 37.8 | 28.0 | 9.8 | - | 10.0 | 12.0 | 5.0 | 14.4 | 4.25 |
| Louisiana | 39.9 | 30.0 | 9.9 | - | 10.0 | 12.0 | 5.0 | 14.4 | 3.67 |
| Oklahoma | 30.2 | 23.3 | 6.9 | - | 7.0 | 8.0 | 3.2 | 13.1 | 3.30 |
| Texas | 26.0 | 19.8 | 6.2 | - | 6.4 | 8.0 | 3.0 | 15.4 | 3.04 |
| W.S.Central | 31.3 | 23.7 | 7.6 | - | 7.8 | 8.8 | 3.5 | 14.6 | 3.35 |
| Montana | 12.6 | 8.0 | 4.6 | 10.0 | 4.6 | 10.0 | 3.4 | 9.9 | 3.04 |
| Idaho | 29.8 | 20.6 | 9.2 | 3/ | 6.0 | 18.0 | 5.0 | 35.2 | 8.53 |
| Wyoming | 12.6 | 8.0 | 4.6 | 10.0 | 4.4 | 10.0 | 3.4 | 10.0 | 4.32 |
| Colorado | 13.3 | 8.0 | 5.3 | 10.0 | 4.4 | 9.5 | 3.4 | 10.0 | 3.70 |
| New Mexico | 13.5 | 8.0 | 5.5 | 10.0 | 4.4 | 11.0 | 3.6 | 13.3 | 5.05 |
| Arizona | 14.5 | 8.5 | 6.0 | 10.0 | 4.4 | 11.5 | 4.0 | 15.2 | 6.50 |
| Utah | 31.3 | 20.6 | 10.7 | 3/ | 6.0 | 18.0 | 5.0 | 24.0 | 9.10 |
| Nevada | 33.6 | 20.6 | 13.0 | 3/ | 6.0 | 18.0 | 5.0 | 26.7 | 8.72 |
| Mountain | 13.8 | 8.4 | 5.4 | 10.0 | 4.4 | 11.0 | 3.5 | 12.4 | 4.66 |
| Washington | 28.3 | 18.1 | 10.2 | 3/ | 6.0 | 18.0 | 5.0 | 34.4 | 10.21 |
| Oregon | 28.9 | 18.4 | 10.5 | 3/ | 6.0 | 16.0 | 5.0 | 30.2 | 6.43 |
| California | 26.0 | 16.1 | 9.9 | 3/ | 6.0 | 18.0 | 5.0 | 32.8 | 8.84 |
| Pacific | 27.7 | 17.5 | 10.2 | - | 6.0 | 17.0 | 5.0 | 32.0 | 7.94 |
| United States: | 27.3 | 17.2 | 10.1 | 19.1 | 7.0 | 15.1 | 4.8 | 23.5 | 6.84 |

1/ According to the 1940 census the following percentage of the total corn acreage in specified States was irrigated in 1939: Montana, 13 percent; Idaho, 92 percent; Wyoming, 20 percent; Colorado, 22 percent; New Mexico, 32 percent; Arizona, 47 percent; Utah, 91 percent; Nevada, 100 percent; Washington, 43 percent; Oregon, 16 percent; and California, 72 percent.

2/ The labor requirements for harvesting corn from the standing stalk are State averages, including machine and hand husking. In the indicated Northern States the corn is usually husked from the standing stalk, pitched directly into a wagon that is driven along the row and then hauled to the crib. In the Southern States where snapping from the standing stalk is indicated, the corn is usually pulled from the stalk, thrown into piles, and later hauled to the crib. Some of the corn is fed in the shuck and some is husked as it is taken from the crib. Previous to pulling corn in the South a part of the crop (probably about one-third) is stripped of its blades and topped. These are tied in small bundles and hauled to the farmstead where they are stored and used largely for mule feed. This practice is becoming less prevalent as the acreages of forage crops is increased.

3/ Some corn is cut, hauled to farmstead and ears pulled as used. Harvest labor required by this method of harvesting is usually from 10 to 15 hours per acre.

CORN: Percentage of planted acreage harvested for different purposes and abandoned, 1939 1/

| State | Percentage of total planted acreage, 1939 | | | | | |
|----------------|---|------------|---------|---------|------------|---------|
| | Cut, | Husked or: | Har- | Har- | Acreage | Total |
| | shocked, | pulled | vested: | vested: | abandoned, | |
| | husked | from | for | by | 1939 | |
| | standing | stalk | silage | other | means | |
| | Percent | Percent | Percent | Percent | Percent | Percent |
| Maine | 29 | - | 57 | 14 | - | 100 |
| New Hampshire | 20 | - | 67 | 13 | - | 100 |
| Vermont | 11 | - | 30 | 9 | - | 100 |
| Massachusetts | 18 | - | 66 | 16 | - | 100 |
| Rhode Island | 20 | - | 70 | 10 | - | 100 |
| Connecticut | 22 | - | 70 | 8 | - | 100 |
| New England | 17 | - | 72 | 11 | - | 100 |
| New York | 25 | - | 60 | 15 | - | 100 |
| New Jersey | 77 | - | 19 | 4 | - | 100 |
| Pennsylvania | 77 | - | 19 | 4 | - | 100 |
| Mid. Atlantic | 61 | - | 32 | 7 | - | 100 |
| Ohio | 85 | 10 | 2 | 3 | - | 100 |
| Indiana | 20 | 75 | 3 | 2 | - | 100 |
| Illinois | 12 | 34 | 2 | 2 | - | 100 |
| Michigan | 74 | 9 | 15 | 2 | - | 100 |
| Wisconsin | 38 | 8 | 48 | 6 | - | 100 |
| E.N. Central | 35 | 54 | 8 | 3 | - | 100 |
| Minnesota | 41 | 38 | 10 | 11 | - | 100 |
| Iowa | 5 | 90 | 2 | 3 | - | 100 |
| Missouri | 18 | 77 | 1 | 4 | - | 100 |
| North Dakota | 7 | 10 | 10 | 71 | 2 | 100 |
| South Dakota | 12 | 53 | 3 | 20 | 12 | 100 |
| Nebraska | 9 | 63 | 5 | 10 | 8 | 100 |
| Kansas | 6 | 57 | 3 | 12 | 17 | 100 |
| W.N. Central | 13 | 67 | 4 | 11 | 5 | 100 |
| Delaware | 97 | - | 2 | 1 | - | 100 |
| Maryland | 95 | - | 4 | 1 | - | 100 |
| Virginia | 94 | - | 3 | 3 | - | 100 |
| West Virginia | 94 | - | 4 | 2 | - | 100 |
| North Carolina | - | 97 | 1 | 2 | - | 100 |
| South Carolina | - | 98 | 2/ | 2 | - | 100 |
| Georgia | - | 98 | 2/ | 2 | - | 100 |
| Florida | - | 98 | 2/ | 2 | - | 100 |
| So. Atlantic | 20 | 77 | 1 | 2 | - | 100 |

- Continued -

CORN: Percentage of planted acreage harvested for different purposes and abandoned, 1939 ^{1/} - Continued

| State | Percentage of total planted acreage, 1939 | | | | | |
|---------------|---|--------------------------------------|----------------------|--------------------------|-------------------------|---------|
| | Cut, shocked, husked | Husked or pulled from standing stalk | Harvested for silage | Harvested by other means | Acreage abandoned, 1939 | Total |
| | Percent | Percent | Percent | Percent | Percent | Percent |
| Kentucky | 98 | - | 1 | 1 | - | 100 |
| Tennessee | 98 | - | 2/ | 2 | - | 100 |
| Alabama | - | 94 | 2/ | 2 | 4 | 100 |
| Mississippi | - | 91 | 2/ | 3 | 6 | 100 |
| E.S. Central | 44 | 51 | 2/ | 2 | 3 | 100 |
| Arkansas | - | 93 | 2/ | 4 | 3 | 100 |
| Louisiana | - | 95 | 2/ | 3 | 2 | 100 |
| Oklahoma | - | 91 | 2/ | 4 | 5 | 100 |
| Texas | - | 88 | 2/ | 7 | 5 | 100 |
| W.S. Central | - | 91 | 2/ | 5 | 4 | 100 |
| Montana | 9 | 27 | 3 | 53 | 8 | 100 |
| Idaho | - | 76 | 15 | 9 | - | 100 |
| Wyoming | 6 | 29 | 4 | 39 | 22 | 100 |
| Colorado | 10 | 42 | 5 | 15 | 28 | 100 |
| New Mexico | 15 | 55 | 2 | 14 | 14 | 100 |
| Arizona | 15 | 36 | 7 | 21 | 21 | 100 |
| Utah | - | 32 | 36 | 32 | - | 100 |
| Nevada | - | 50 | 50 | - | - | 100 |
| Mountain | 10 | 41 | 5 | 21 | 23 | 100 |
| Washington | - | 38 | 28 | 34 | - | 100 |
| Oregon | - | 53 | 30 | 17 | - | 100 |
| California | - | 64 | 18 | 18 | - | 100 |
| Pacific | - | 54 | 25 | 21 | - | 100 |
| United States | 22 | 64 | 5 | 6 | 3 | 100 |

^{1/} These estimated percentages are only approximate. Undoubtedly in some States some corn is harvested by all of the methods shown.

^{2/} Less than one percent.

GRAIN SORGHUMS: Labor requirements per acre 1/

| State | Man hours per acre | | | 1929-38 average yield per acre |
|--------------------|--------------------|------------|---------|---|
| | Total | Preharvest | Harvest | |
| | Hours | Hours | Hours | Bushels |
| Missouri | 15.0 | 8.0 | 7.0 | 12.6 |
| South Dakota | 12.5 | 6.0 | 6.5 | <u>2/</u> 9.5 |
| Nebraska | 12.5 | 6.0 | 6.5 | 11.8 |
| Kansas | 12.0 | 6.0 | 6.0 | 10.4 |
| West North Central | 12.3 | 6.1 | 6.2 | 10.6 |
| Arkansas | 18.0 | 10.0 | 8.0 | 10.6 |
| Oklahoma | 12.0 | 6.0 | 6.0 | 9.5 |
| Texas | 11.5 | 5.0 | 6.5 | 14.1 |
| West South Central | 11.7 | 5.3 | 6.4 | 12.8 |
| Colorado | 12.0 | 6.0 | 6.0 | 9.4 |
| New Mexico | 11.5 | 5.5 | 6.0 | 11.8 |
| Arizona | 17.0 | 9.0 | 8.0 | 28.5 |
| Mountain | 11.9 | 5.8 | 6.1 | 13.2 |
| California | 18.0 | 10.0 | 8.0 | 29.0 |
| United States | 12.1 | 5.7 | 6.4 | 12.9 |

1/ Harvested for grain. Harvesting in the form of bundles, heads, or silage usually requires about one-half hour less per acre, including hauling. Includes kafirs, milo, feterita, durra, etc.

According to the 1940 census the following percentage of the total grain sorghum acreage in specified States was irrigated in 1939: Colorado, 6 percent; New Mexico, 7 percent; Arizona, 93 percent; and California, 85 percent.

2/ Yield for 1939.

OATS: Labor requirements per acre 1/

| State | Man hours per acre | | | | | | 1930-39 average yield per acre |
|--------------------|--------------------|----------|----------|---------------|----------|----------|---|
| | Threshed 2/ | | | Unthreshed 3/ | | | |
| | : Pre- : | | | : Pre- : | | | |
| | Total: | harvest: | Harvest: | Total: | harvest: | Harvest: | |
| | Hours | Hours | Hours | Hours | Hours | Hours | |
| Maine | 30.0 | 15.0 | 15.0 | 22.5 | 15.0 | 7.5 | 36.8 |
| New Hampshire | 30.0 | 15.0 | 15.0 | 22.5 | 15.0 | 7.5 | 37.2 |
| Vermont | 30.0 | 15.0 | 15.0 | 22.5 | 15.0 | 7.5 | 31.3 |
| Massachusetts | 20.0 | 9.0 | 11.0 | 15.0 | 9.0 | 6.0 | 33.0 |
| Rhode Island | 20.0 | 9.0 | 11.0 | 15.0 | 9.0 | 6.0 | 31.7 |
| Connecticut | 20.0 | 9.0 | 11.0 | 15.0 | 9.0 | 6.0 | 28.8 |
| New England | 29.5 | 14.7 | 14.8 | 20.8 | 13.6 | 7.2 | 35.2 |
| New York | 16.0 | 7.2 | 8.8 | 12.8 | 7.2 | 5.6 | 28.8 |
| New Jersey | 15.5 | 7.0 | 8.5 | 12.4 | 7.0 | 5.4 | 29.6 |
| Pennsylvania | 16.0 | 7.2 | 8.8 | 12.8 | 7.2 | 5.6 | 28.4 |
| Middle Atlantic | 15.8 | 7.2 | 8.6 | 12.8 | 7.2 | 5.6 | 28.6 |
| Ohio | 10.6 | 4.2 | 6.4 | 10.0 | 4.2 | 5.8 | 30.7 |
| Indiana | 8.0 | 2.4 | 5.6 | 7.2 | 2.4 | 4.8 | 26.0 |
| Illinois | 7.4 | 1.8 | 5.6 | 7.0 | 1.8 | 5.2 | 30.2 |
| Michigan | 11.6 | 5.2 | 6.4 | - | - | - | 29.8 |
| Wisconsin | 12.8 | 5.8 | 7.0 | 12.2 | 5.8 | 6.4 | 30.8 |
| East North Central | 9.7 | 3.6 | 6.1 | 8.0 | 2.7 | 5.3 | 29.8 |
| Minnesota | 7.6 | 1.9 | 5.7 | - | - | - | 31.2 |
| Iowa | 7.2 | 1.8 | 5.4 | 6.8 | 1.8 | 5.0 | 31.4 |
| Missouri | 10.0 | 4.0 | 6.0 | 9.0 | 4.0 | 5.0 | 21.5 |
| North Dakota | 6.0 | 2.4 | 3.6 | 6.6 | 2.4 | 4.2 | 18.6 |
| South Dakota | 5.8 | 2.3 | 3.5 | 6.4 | 2.3 | 4.1 | 21.3 |
| Nebraska | 5.4 | 1.6 | 3.8 | 5.6 | 1.6 | 4.0 | 20.3 |
| Kansas | 6.5 | 2.6 | 3.9 | 6.5 | 2.6 | 3.9 | 21.8 |
| West North Central | 7.1 | 2.2 | 4.9 | 7.4 | 2.9 | 4.5 | 22.4 |
| Delaware | 14.0 | 6.3 | 7.7 | - | - | - | 30.2 |
| Maryland | 16.0 | 7.2 | 8.8 | - | - | - | 28.4 |
| Virginia | 20.0 | 9.0 | 11.0 | 15.0 | 9.0 | 6.0 | 19.6 |
| West Virginia | 21.0 | 9.4 | 11.6 | 15.7 | 9.4 | 6.3 | 19.6 |
| North Carolina | 19.0 | 7.6 | 11.4 | 13.3 | 7.6 | 5.7 | 19.6 |
| South Carolina | 18.0 | 7.2 | 10.8 | 12.6 | 7.2 | 5.4 | 21.4 |
| Georgia | 18.0 | 7.2 | 10.8 | 12.6 | 7.2 | 5.4 | 19.2 |
| Florida | 18.0 | 7.2 | 10.8 | 12.6 | 7.2 | 5.4 | 14.7 |
| South Atlantic | 18.4 | 7.5 | 10.9 | 13.0 | 7.5 | 5.5 | 20.6 |

- Continued -

OATS: Labor requirements per acre 1/ - Continued

| State | Man hours per acre | | | | | | 1930-39 average yield per acre |
|--------------------|--------------------|-----------------|---------|---------------|-----------------|---------|---|
| | Threshed 2/ | | | Unthreshed 3/ | | | |
| | Total | Pre- harvest | Harvest | Total | Pre- harvest | Harvest | |
| | Hours | Hours | Hours | Hours | Hours | Hours | |
| Kentucky | 16.0 | 7.2 | 8.8 | 12.8 | 7.2 | 5.6 | 16.3 |
| Tennessee | 17.0 | 6.8 | 10.2 | 11.9 | 6.8 | 5.1 | 16.2 |
| Alabama | 18.0 | 7.2 | 10.8 | 12.6 | 7.2 | 5.4 | 19.2 |
| Mississippi | 18.0 | 7.2 | 10.8 | 12.6 | 7.2 | 5.4 | 23.5 |
| East South Central | 17.4 | 7.1 | 10.3 | 12.5 | 7.1 | 5.4 | 19.1 |
| Arkansas | 13.0 | 8.1 | 9.9 | 13.5 | 8.1 | 5.4 | 19.4 |
| Louisiana | 13.0 | 8.1 | 9.9 | 13.5 | 8.1 | 5.4 | 25.0 |
| Oklahoma | 10.0 | 4.0 | 6.0 | 9.5 | 4.0 | 5.5 | 20.0 |
| Texas | 10.0 | 4.0 | 6.0 | 9.5 | 4.0 | 5.5 | 23.8 |
| West South Central | 10.4 | 4.2 | 6.2 | 10.1 | 4.6 | 5.5 | 21.9 |
| Montana | 8.9 | 4.0 | 4.9 | 8.6 | 4.0 | 4.6 | 23.0 |
| Idaho | 10.5 | 4.2 | 6.3 | 9.4 | 4.2 | 5.2 | 35.9 |
| Wyoming | 11.5 | 4.6 | 6.9 | 10.4 | 4.6 | 5.8 | 24.4 |
| Colorado | 12.5 | 5.6 | 6.9 | 10.6 | 5.6 | 5.0 | 27.8 |
| New Mexico | 12.5 | 5.6 | 6.9 | 10.6 | 5.6 | 5.0 | 23.4 |
| Arizona | 12.4 | 5.3 | 6.6 | 10.6 | 5.3 | 4.8 | 26.7 |
| Utah | 14.0 | 7.4 | 6.6 | 12.2 | 7.4 | 4.8 | 35.8 |
| Nevada | 15.7 | 8.0 | 7.7 | 12.2 | 8.0 | 4.2 | 35.3 |
| Mountain | 10.7 | 4.7 | 6.0 | 9.8 | 4.9 | 4.9 | 27.4 |
| Washington | 9.3 | 4.0 | 5.3 | 9.0 | 4.0 | 5.0 | 48.2 |
| Oregon | 9.4 | 4.0 | 5.4 | 9.0 | 4.0 | 5.0 | 31.3 |
| California | 8.3 | 3.5 | 4.8 | 8.0 | 3.5 | 4.5 | 27.3 |
| Pacific | 9.2 | 3.9 | 5.3 | 8.4 | 3.7 | 4.7 | 36.1 |
| United States | 9.0 | 3.4 | 5.6 | 8.6 | 3.4 | 5.2 | 25.3 |

1/ According to the 1940 census the following percentage of the total oat acreage in specified States was irrigated in 1939; Montana, 32 percent; Idaho, 40 percent; Wyoming, 71 percent; Colorado, 57 percent; New Mexico, 48 percent; Arizona, 68 percent; Utah, 95 percent; Nevada, 100 percent; Washington, 13 percent; Oregon, 13 percent; and California, 16 percent.

2/ Includes oats that were combined.

3/ Includes grain cut with binder, mower, and cradle for feed in the straw.

OATS: Acreage harvested by different methods in 1938, and
machine and labor performance for harvesting by
different methods 1/

| State | Oats acreage harvested with - | | |
|----------------|-------------------------------|---------|---------------|
| | Combine | Binder | Other methods |
| | | | 2/ |
| | Percent | Percent | Percent |
| New York | 5 | 86 | 9 |
| New Jersey | 18 | 70 | 12 |
| Pennsylvania | 4 | 91 | 5 |
| Mid. Atlantic | 5 | 88 | 7 |
| Ohio | 14 | 85 | 1 |
| Indiana | 20 | 78 | 2 |
| Illinois | 22 | 77 | 1 |
| Michigan | 9 | 89 | 2 |
| Wisconsin | 3 | 95 | 2 |
| E. N. Central | 14 | 84 | 2 |
| Minnesota | 3 | 96 | 1 |
| Iowa | 8 | 91 | 1 |
| Missouri | 9 | 82 | 9 |
| North Dakota | 6 | 89 | 5 |
| South Dakota | 2 | 96 | 2 |
| Nebraska | 6 | 92 | 2 |
| Kansas | 18 | 80 | 2 |
| W. N. Central | 7 | 91 | 2 |
| Delaware | 5 | 95 | 3/ |
| Maryland | 2 | 92 | 6 |
| Virginia | 4 | 60 | 36 |
| West Virginia | 2 | 35 | 63 |
| North Carolina | 12 | 44 | 44 |
| South Carolina | 7 | 53 | 40 |
| Georgia | 7 | 41 | 52 |
| So. Atlantic | 3 | 48 | 44 |
| Kentucky | 3 | 62 | 35 |
| Tennessee | 5 | 71 | 24 |
| Alabama | 10 | 18 | 72 |
| Mississippi | 23 | 19 | 58 |
| E. S. Central | 10 | 39 | 51 |
| Arkansas | 4 | 41 | 55 |
| Louisiana | 26 | 22 | 52 |
| Oklahoma | 10 | 34 | 6 |
| Texas | 13 | 73 | 9 |
| W. S. Central | 12 | 60 | 28 |

OATS: Acreage harvested by different methods in 1938, and machine and labor performance for harvesting by different methods 1/ - Continued

| State | Oats acreage harvested with - | | |
|---------------|-------------------------------|---------|---------------|
| | Combine | Binder | Other methods |
| | | | 2/ |
| | Percent | Percent | Percent |
| Montana | 10 | 81 | 9 |
| Idaho | 25 | 73 | 2 |
| Wyoming | 7 | 80 | 13 |
| Colorado | 7 | 86 | 7 |
| New Mexico | 15 | 74 | 11 |
| Arizona | 22 | 78 | - |
| Utah | 6 | 94 | 3/ |
| Nevada | 47 | 53 | - |
| Mountain | 11 | 81 | 8 |
| Washington | 35 | 59 | 6 |
| Oregon | 37 | 61 | 2 |
| California | 4/ | 4/ | 4/ |
| Pacific | 37 | 60 | 3 |
| United States | 10 | 83 | 7 |

1/ Acreages harvested by different methods taken from U.S.D.A. Agricultural Statistics, 1940, table 686, page 563. Data on performance summarized from Federal and State data.

2/ Includes grain cut with header, mower and cradle.

3/ Less than one-half of one percent.

4/ No data obtained.

Machine and Labor Performance

The percentage of oat acreage combined is considerably less than that of wheat because oat straw is more valuable for livestock feed and bedding.

The rate of combining oats is about the same as that for wheat. The performances of combines by size are shown in the wheat statement, page 13.

Rates of performance in cutting and shocking oats and wheat are about the same unless there is considerable difference in growth. Hauling to the barn or stack and threshing from barn, stack or field frequently are somewhat higher for oats than for wheat because of the additional oat growth and yield. In the Middle West and East it takes around one hour more for oats than for wheat. Rates of work are shown in the wheat statement, page 13.

RICE: Labor requirements per acre 1/

| State | Man hours per acre | | | 1930-39 |
|---------------|--------------------|--------------|--------------|----------------|
| | | | | average |
| | Total | Preharvest | Harvest | yield |
| | | | | per acre |
| | <u>Hours</u> | <u>Hours</u> | <u>Hours</u> | <u>Bushels</u> |
| Arkansas | 32.0 | 18.0 | 14.0 | 50.5 |
| Louisiana | 33.0 | 19.0 | 14.0 | 40.7 |
| Texas | 31.0 | 18.0 | 13.0 | 51.7 |
| California | 30.0 | 16.0 | 14.0 | 69.6 |
| United States | 32.0 | 18.0 | 14.0 | 48.5 |

1/ High seasonal temperature, soils of medium to rather heavy texture and irrigation limit rice production. Rice is harvested with a binder and placed in shocks of 10 to 12 bundles. In good weather rice requires 10 to 14 days to cure before it is thrashed.

RYE: Labor requirements per acre 1/

| State | Man hours per acre | | | Percentage | |
|----------------|--------------------|-------------|---------|------------|--------------------|
| | 1930-39 | | | of 1930-38 | |
| | average | | | average | |
| | yield | | | acreage | |
| | Total | Pre-harvest | Harvest | per acre | that was harvested |
| | Hours | Hours | Hours | Bushels | Percent |
| New York | 18.2 | 8.6 | 9.6 | 15.8 | 37.3 |
| New Jersey | 16.3 | 6.8 | 9.5 | 17.3 | 26.1 |
| Pennsylvania | 18.1 | 8.3 | 9.8 | 14.1 | 78.0 |
| Mid. Atlantic | 17.5 | 7.8 | 9.7 | 15.0 | 53.2 |
| Ohio | 14.7 | 6.1 | 8.6 | 14.0 | 46.3 |
| Indiana | 13.1 | 5.7 | 7.4 | 11.8 | 54.8 |
| Illinois | 11.3 | 4.8 | 6.5 | 12.1 | 47.1 |
| Michigan | 15.2 | 7.0 | 8.2 | 12.1 | 68.3 |
| Wisconsin | 15.5 | 7.0 | 8.5 | 10.9 | 67.8 |
| E. N. Central | 14.2 | 6.2 | 8.0 | 11.9 | 59.2 |
| Minnesota | 10.0 | 4.0 | 6.0 | 15.0 | 78.3 |
| Iowa | 10.5 | 4.5 | 6.0 | 14.5 | 50.3 |
| Missouri | 14.6 | 7.6 | 7.0 | 9.4 | 27.4 |
| North Dakota | 7.0 | 3.0 | 4.0 | 9.2 | 60.5 |
| South Dakota | 6.3 | 2.7 | 3.6 | 10.5 | 45.7 |
| Nebraska | 6.1 | 2.6 | 3.5 | 8.9 | 62.6 |
| Kansas | 5.2 | 2.5 | 2.7 | 10.5 | 37.7 |
| W. N. Central | 7.5 | 3.2 | 4.3 | 10.8 | 57.7 |
| Delaware | 16.2 | 7.5 | 8.7 | 12.4 | 53.8 |
| Maryland | 17.1 | 7.5 | 9.6 | 13.0 | 47.5 |
| Virginia | 20.7 | 9.7 | 11.0 | 11.6 | 41.9 |
| West Virginia | 21.9 | 10.5 | 11.4 | 11.7 | 57.9 |
| North Carolina | 20.6 | 10.4 | 10.2 | 7.5 | 38.5 |
| South Carolina | 21.3 | 10.8 | 10.5 | 8.4 | 37.0 |
| Georgia | 19.8 | 9.0 | 10.8 | 6.0 | 30.5 |
| So. Atlantic | 20.0 | 9.6 | 10.4 | 9.5 | 40.3 |
| Kentucky | 15.0 | 6.5 | 8.5 | 10.9 | 16.0 |
| Tennessee | 17.3 | 7.6 | 9.7 | 6.9 | 22.5 |
| E. S. Central | 16.5 | 7.1 | 9.4 | 7.9 | 19.5 |

- Continued -

RYE: Labor requirements per acre 1/ - Continued

| State | Man hours per acre | | | 1930-39 | Percentage |
|---------------|--------------------|-------------|---------|----------|------------|
| | | | | average | of 1930-38 |
| | | | | yield | acreage |
| | Total | Pre-harvest | Harvest | per acre | that was |
| | | | | | harvested |
| | Hours | Hours | Hours | Bushels | Percent |
| Oklahoma | 6.8 | 3.8 | 3.0 | 7.9 | 39.1 |
| Texas | 4.4 | 2.2 | 2.2 | 10.0 | 42.8 |
| W. S. Central | 6.6 | 3.7 | 2.9 | 8.1 | 39.5 |
| Montana | 6.3 | 3.0 | 3.3 | 9.4 | 47.9 |
| Idaho | 10.6 | 4.8 | 5.8 | 10.7 | 42.9 |
| Wyoming | 7.4 | 3.4 | 4.0 | 6.5 | 51.1 |
| Colorado | 7.1 | 3.7 | 3.4 | 7.2 | 50.0 |
| Utah | 10.0 | 6.0 | 4.0 | 7.6 | 75.0 |
| Mountain | 7.2 | 3.6 | 3.6 | 7.9 | 49.5 |
| Washington | 6.5 | 3.5 | 3.0 | 8.3 | 40.4 |
| Oregon | 6.8 | 3.6 | 3.2 | 12.5 | 31.6 |
| California | 5.0 | 3.0 | 2.0 | 12.6 | 61.5 |
| Pacific | 6.6 | 3.5 | 3.1 | 11.1 | 36.3 |
| United States | 9.9 | 4.5 | 5.4 | 10.9 | 53.9 |

1/ These requirements are for rye harvested for grain. On the average only about 54 percent of the rye acreage that is seeded for all purposes is harvested. Much of the crop that is not harvested is plowed under. The preharvest hours shown for rye that is harvested for grain are fairly representative of the total hours per acre spent on rye that is not harvested.

According to the 1940 census the following percentage of the total rye acreage was irrigated in 1939: Montana, 3 percent; Idaho, 29 percent; Wyoming, 9 percent; Colorado, 9 percent; Utah, 38 percent; Washington, 2 percent; Oregon, 20 percent; and California, 17 percent.

Machine and labor performance

In general, the rate of combining rye is about the same as that for wheat. This is true also for cutting, shocking, and threshing, unless there is considerable difference in growth. (See page 18)

WHEAT: Labor requirements per acre 1/

| State | Man hours per acre | | | 1930-39 average yield per acre |
|----------------|--------------------|------------|---------|---|
| | Total | Preharvest | Harvest | |
| | Hours | Hours | Hours | |
| | Bushels | | | |
| Maine | 23.3 | 11.2 | 12.1 | 20.2 |
| New York | 18.2 | 8.6 | 9.6 | 21.6 |
| New Jersey | 16.3 | 6.8 | 9.5 | 22.2 |
| Pennsylvania | 18.1 | 8.3 | 9.8 | 19.7 |
| Mid. Atlantic | 18.1 | 8.5 | 9.6 | 20.2 |
| Ohio | 14.7 | 6.1 | 8.6 | 20.1 |
| Indiana | 13.1 | 5.7 | 7.4 | 17.6 |
| Illinois | 11.3 | 4.8 | 6.5 | 18.0 |
| Michigan | 15.2 | 7.0 | 8.2 | 20.7 |
| Wisconsin | 15.2 | 6.9 | 8.3 | 16.4 |
| E. N. Central | 13.3 | 5.7 | 7.6 | 18.8 |
| Minnesota | 9.9 | 3.8 | 6.1 | 13.3 |
| Iowa | 10.6 | 4.5 | 6.1 | 17.4 |
| Missouri | 14.6 | 7.6 | 7.0 | 14.4 |
| North Dakota | 6.5 | 2.8 | 3.7 | 8.0 |
| South Dakota | 5.9 | 2.5 | 3.4 | 7.7 |
| Nebraska | 5.7 | 2.4 | 3.3 | 13.1 |
| Kansas | 4.6 | 2.3 | 2.3 | 11.8 |
| W. N. Central | 6.3 | 2.9 | 3.4 | 10.9 |
| Delaware | 16.2 | 7.5 | 8.7 | 17.5 |
| Maryland | 17.3 | 7.5 | 9.8 | 19.2 |
| Virginia | 21.1 | 9.9 | 11.2 | 14.4 |
| West Virginia | 22.2 | 10.6 | 11.6 | 15.0 |
| North Carolina | 20.9 | 10.4 | 10.5 | 10.9 |
| South Carolina | 21.6 | 10.9 | 10.7 | 10.0 |
| Georgia | 20.1 | 8.9 | 11.2 | 9.2 |
| So. Atlantic | 20.0 | 9.5 | 10.5 | 13.8 |
| Kentucky | 15.4 | 6.6 | 8.8 | 14.0 |
| Tennessee | 17.8 | 7.8 | 10.0 | 11.3 |
| Alabama | 22.4 | 12.0 | 10.4 | 10.4 |
| E. S. Central | 16.6 | 7.2 | 9.4 | 12.6 |

- Continued -

WHEAT: Labor requirements per acre 1/ ..Continued

| State | Man hours per acre | | | 1930-39 average yield per acre |
|---------------|--------------------|------------|---------|---|
| | Total | Preharvest | Harvest | |
| | Hours | Hours | Hours | |
| Arkansas | 16.9 | 8.3 | 8.6 | 9.1 |
| Oklahoma | 6.7 | 3.8 | 2.9 | 11.6 |
| Texas | 4.1 | 2.0 | 2.1 | 9.6 |
| W. S. Central | 5.6 | 3.0 | 2.6 | 10.8 |
| Montana | 6.2 | 2.9 | 3.3 | 10.4 |
| Idaho | 10.6 | 4.8 | 5.8 | 22.7 |
| Wyoming | 7.4 | 3.4 | 4.0 | 10.7 |
| Colorado | 7.5 | 3.9 | 3.6 | 12.0 |
| New Mexico | 6.2 | 2.5 | 3.7 | 9.8 |
| Arizona | 12.5 | 8.5 | 4.0 | 22.4 |
| Utah | 13.2 | 8.2 | 5.0 | 19.6 |
| Nevada | 11.3 | 7.6 | 3.7 | 24.6 |
| Mountain | 7.5 | 3.6 | 3.9 | 12.8 |
| Washington | 6.8 | 3.6 | 3.2 | 20.6 |
| Oregon | 7.3 | 3.9 | 3.4 | 19.8 |
| California | 5.4 | 3.2 | 2.2 | 18.2 |
| Pacific | 6.6 | 3.6 | 3.0 | 19.9 |
| United States | 8.7 | 4.6 | 4.1 | 13.3 |

1/ According to the 1940 Census the following percentage of the total wheat acreage was irrigated in 1939: Montana, 5 percent; Idaho, 21 percent; Wyoming, 8 percent; Colorado, 17 percent; New Mexico, 8 percent; Arizona, 93 percent; Utah, 36 percent; Nevada, 100 percent; Washington, 1 percent; Oregon, 5 percent; and California, 13 percent.

WHEAT: Acreage harvested by different methods in 1938, and machine and labor performance for harvesting by different methods 1/

| State | Wheat acreage harvested with - | | | Combine Performance 4/ | | |
|----------------|--------------------------------|---------|---------|--|-------|-----|
| | : : : Other | | | Width Usual acreage Usual size | | |
| | : Combine: Binder: methods | | | of cut per 10- of crew | | |
| | : : : 2/ | | | cut hour day (Not including grain haulers) | | |
| | Percent | Percent | Percent | Feet | Acres | Men |
| | | | | 5 and 6 | 13-18 | 1 |
| New York | 11 | 87 | 2 | 8 | 18-21 | 2 |
| New Jersey | 24 | 73 | 3 | 10 | 20-28 | 2 |
| Pennsylvania | 6 | 92 | 2 | 12 | 24-33 | 2 |
| Mid. Atlantic | 8 | 90 | 2 | 14 | 28-36 | 2 |
| | | | | 15 | 30-39 | 2 |
| Ohio | 22 | 77 | 1 | 16 | 34-40 | 2-3 |
| Indiana | 30 | 69 | 1 | 18 | 36-42 | 2-3 |
| Illinois | 44 | 55 | 1 | 20 | 40-45 | 2-3 |
| Michigan | 16 | 84 | 3/ | 22 | 44-48 | 2-3 |
| Wisconsin | 3 | 96 | 1 | | | |
| E.N. Central | 30 | 69 | 1 | Notes on performances. - | | |
| | | | | Binder performance per 10-hour day: | | |
| Minnesota | 6 | 94 | 3/ | Horse-drawn - 1½ acres per foot cut | | |
| Iowa | 28 | 72 | 3/ | Tractor-drawn - 2½ acres per foot cut | | |
| Missouri | 22 | 76 | 2 | | | |
| North Dakota | 23 | 70 | 7 | | | |
| South Dakota | 19 | 71 | 10 | In the Great Plains Area one good | | |
| Nebraska | 51 | 48 | 1 | man will shock 10 to 12 acres of wheat | | |
| Kansas | 82 | 16 | 2 | in a 10-hour day; in the Middle West | | |
| W.N. Central | 48 | 48 | 4 | and East, where grain is heavier and | | |
| | | | | the shocks prepared better, one man | | |
| Delaware | 11 | 89 | 3/ | will shock 5 to 8 acres in a 10-hour | | |
| Maryland | 3 | 96 | 1 | day. | | |
| Virginia | 3 | 83 | 14 | | | |
| West Virginia | 1 | 58 | 41 | Wheat cut with a binder, stacked | | |
| North Carolina | 11 | 67 | 22 | and threshed in the Great Plains Region, | | |
| South Carolina | 8 | 62 | 30 | requires from 5½ to 6½ hours per acre; | | |
| Georgia | 11 | 45 | 44 | in the Middle West and East, from 7 to | | |
| So. Atlantic | 6 | 76 | 18 | 9 hours per acre. Wheat threshed from | | |
| | | | | the shock takes from 3½ to 4½ hours per | | |
| Kentucky | 8 | 85 | 7 | acre in the Great Plains, and 6 to 7½ | | |
| Tennessee | 6 | 85 | 9 | hours per acre in the Middle West and | | |
| Alabama | 22 | 35 | 43 | East. Wheat stored in the barn and | | |
| E.S. Central | 7 | 85 | 8 | threshed in the North and East requires | | |
| | | | | 8 to 10 hours per acre. Wheat cut with | | |
| Arkansas | 12 | 68 | 20 | a cradle, stacked and threshed, takes | | |
| Oklahoma | 70 | 28 | 2 | 16 to 18 hours per acre. Grain hauled, | | |
| Texas | 82 | 18 | 3/ | stacked and threshed in the Great Plains | | |
| W.S. Central | 75 | 24 | 1 | requires 3½ to 4½ hours per acre. | | |

WHEAT: Acreage harvested by different methods in 1938, and machine and labor performance for harvesting by different methods 1/ -
Continued

| State | Wheat acreage harvested with - | | |
|---------------|--------------------------------|----------------|----------------|
| | Combine | Binder | Other methods |
| | | | <u>2/</u> |
| | <u>Percent</u> | <u>Percent</u> | <u>Percent</u> |
| Montana | 55 | 40 | 5 |
| Idaho | 40 | 57 | 3 |
| Wyoming | 32 | 60 | 8 |
| Colorado | 44 | 41 | 15 |
| New Mexico | 58 | 37 | 5 |
| Arizona | 93 | 7 | <u>2/</u> |
| Utah | 41 | 56 | 3 |
| Nevada | 63 | 24 | 13 |
| Mountain | 50 | 44 | 6 |
| Washington | 83 | 14 | 3 |
| Oregon | 78 | 21 | 1 |
| California | 95 | 4 | 1 |
| Pacific | 84 | 14 | 2 |
| United States | 49 | 47 | 4 |

1/ Acreages harvested by different methods taken from U.S.D.A. Agricultural Statistics, 1940, table 686, page 563. Data on performance summarized from Federal and State data.

2/ Includes grain cut with header, mower and cradle.

3/ Less than one-half of one percent.

4/ In the Pacific Northwest, larger crews are needed when the grain is sacked. These vary from 3 men on 12- to 14-foot combines to 5 men on 18- to 20-foot combines.

ALFALFA: Labor requirements per acre 1/

| State | Alfalfa hay | | | | Alfalfa seed | | |
|----------------|--------------------|-----------------|---------|-----------------------------|--------------|-----------|---------|
| | Man hours per acre | | | Usual cuttings a year | 1929-33 | Man hours | 1929-33 |
| | Total | Pre- harvest | Harvest | | average | per acre | average |
| | | | | | yield | for | yield |
| | Hours | Hours | Hours | Number | Tons | Hours | Bushels |
| Maine | 18.0 | 2.0 | 16.0 | 2-3 | 1.48 | -- | -- |
| New Hampshire | 18.5 | 2.0 | 16.5 | 2-3 | 1.97 | -- | -- |
| Vermont | 18.5 | 2.0 | 16.5 | 2-3 | 2.20 | -- | -- |
| Massachusetts | 19.5 | 2.0 | 17.5 | 2-3 | 2.26 | -- | -- |
| Rhode Island | 19.5 | 2.0 | 17.5 | 2-3 | 2.28 | -- | -- |
| Connecticut | 21.0 | 2.0 | 19.0 | 2-3 | 2.78 | -- | -- |
| New England | 19.5 | 2.0 | 17.5 | -- | 2.26 | -- | -- |
| New York | 17.5 | 2.0 | 15.5 | 2-3 | 1.89 | -- | -- |
| New Jersey | 19.0 | 2.0 | 17.0 | 2-3 | 2.16 | -- | -- |
| Pennsylvania | 17.0 | 2.0 | 15.0 | 2-3 | 1.39 | -- | -- |
| Mid. Atlantic | 17.4 | 2.0 | 15.4 | -- | 1.91 | -- | -- |
| Ohio | 18.5 | 1.5 | 17.0 | 2-3 | 1.82 | 7.5 | 1.2 |
| Indiana | 17.5 | 1.5 | 16.0 | 2-3 | 1.69 | 7.5 | 1.0 |
| Illinois | 19.5 | 1.5 | 18.0 | 3 | 2.04 | -- | -- |
| Michigan | 17.0 | 1.5 | 15.5 | 2-3 | 1.53 | 8.0 | 1.3 |
| Wisconsin | 19.0 | 1.5 | 17.5 | 2-3 | 1.96 | 7.5 | 1.1 |
| E. N. Central | 18.2 | 1.5 | 16.7 | -- | 1.77 | 7.7 | 1.2 |
| Minnesota | 17.0 | 2.0 | 15.0 | 2-3 | 1.72 | 7.3 | 1.4 |
| Iowa | 18.5 | 2.0 | 16.5 | 3 | 2.07 | 6.5 | 1.5 |
| Missouri | 18.0 | 1.5 | 16.5 | 3 | 1.90 | -- | -- |
| North Dakota | 12.0 | 1.5 | 10.5 | 2 | 1.02 | 6.5 | .9 |
| South Dakota | 10.2 | 1.2 | 9.0 | 2 | .94 | 6.5 | 1.0 |
| Nebraska | 15.0 | 2.2 | 12.8 | 3 | 1.51 | 6.5 | 1.4 |
| Kansas | 15.0 | 2.2 | 12.8 | 3 | 1.52 | 9.0 | 1.3 |
| W. N. Central | 16.3 | 2.0 | 14.3 | -- | 1.57 | 7.6 | 1.4 |
| Delaware | 22.0 | 3.0 | 19.0 | 3 | 2.32 | -- | -- |
| Maryland | 20.0 | 3.0 | 17.0 | 3 | 1.95 | -- | -- |
| Virginia | 21.0 | 3.0 | 18.0 | 3 | 1.72 | -- | -- |
| West Virginia | 22.0 | 3.0 | 19.0 | 3 | 1.76 | -- | -- |
| North Carolina | 24.2 | 3.2 | 21.0 | 3 | 1.82 | -- | -- |
| South Carolina | 24.5 | 3.5 | 21.0 | 3 | 1.71 | -- | -- |
| Georgia | 24.0 | 3.0 | 21.0 | 3 | 1.78 | -- | -- |
| So. Atlantic | 21.4 | 3.0 | 18.4 | -- | 1.82 | -- | -- |

- Continued -

ALFALFA: Labor requirements per acre 1/ - Continued

| State | Alfalfa hay | | | | | Alfalfa seed | |
|---------------|--------------------|-------------|-----------------------|----------------------------------|-----------------------------------|----------------------------------|---------|
| | Man hours per acre | | Usual cuttings a year | : 1929-33 average yield per acre | Man hours per acre for harvesting | : 1929-33 average yield per acre | |
| | Total | Pre-harvest | | | | | Harvest |
| | | | | | | | |
| | | | | | | | |
| Hours | Hours | Hours | Number | Tons | Hours | Bushels | |
| Kentucky | 20.5 | 2.5 | 13.0 | 3 | 1.56 | — | — |
| Tennessee | 20.5 | 2.5 | 13.0 | 3 | 1.62 | — | — |
| Alabama | 22.0 | 2.5 | 19.5 | 3 | 1.39 | — | — |
| Mississippi | 29.0 | 3.0 | 26.0 | 4 | 2.20 | — | — |
| E. S. Central | 22.2 | 2.6 | 19.6 | — | 1.70 | — | — |
| Arkansas | 27.0 | 3.0 | 24.0 | 4 | 1.87 | — | — |
| Louisiana | 23.0 | 3.0 | 25.0 | 4 | 2.08 | — | — |
| Oklahoma | 17.0 | 2.0 | 15.0 | 3 | 1.76 | 10.0 | 2.5 |
| Texas | 23.0 | 6.0 | 22.0 | 3-5 | 2.27 | 10.0 | 2.8 |
| W. S. Central | 21.7 | 3.1 | 13.6 | — | 1.83 | 10.0 | 2.5 |
| Montana | 19.0 | 5.0 | 14.0 | 2-3 | 1.55 | 8.0 | 2.0 |
| Idaho | 22.0 | 5.5 | 16.5 | 3 | 2.42 | 3.0 | 2.6 |
| Wyoming | 18.5 | 5.5 | 13.0 | 2-3 | 1.43 | 3.0 | 2.1 |
| Colorado | 21.0 | 6.0 | 15.0 | 3 | 1.39 | 3.0 | 2.6 |
| New Mexico | 23.0 | 8.0 | 20.0 | 4 | 2.37 | 12.0 | 3.5 |
| Arizona | 30.0 | 10.0 | 20.0 | 4 | 2.90 | 12.5 | 4.8 |
| Utah | 22.0 | 6.0 | 16.0 | 3 | 2.06 | 9.0 | 1.9 |
| Nevada | 22.0 | 5.0 | 17.0 | 3 | 2.17 | — | — |
| Mountain | 21.4 | 5.9 | 15.5 | — | 1.99 | 9.1 | 2.6 |
| Washington | 21.0 | 3.5 | 17.5 | 3-4 | 2.52 | — | — |
| Oregon | 23.0 | 5.5 | 17.5 | 3-4 | 2.50 | 9.0 | 2.7 |
| California | 39.0 | 14.0 | 25.0 | 4-6 | 4.02 | 12.0 | 3.4 |
| Pacific | 31.7 | 9.9 | 21.8 | — | 3.43 | 11.2 | 3.3 |
| United States | 20.0 | 3.6 | 16.4 | — | 1.94 | 3.3 | 1.9 |

1/ Hay stored loose. See page 22 for data on baling hay. According to the 1940 census, the percentage of the total alfalfa hay acreage that was irrigated in 1939 was as follows: Texas, 45 percent; Montana, 69 percent; Idaho, 79 percent; Wyoming, 88 percent; Colorado, 92 percent; New Mexico, 96 percent; Arizona, 98 percent; Utah, 91 percent; Nevada, 100 percent; Washington, 44 percent; Oregon, 72 percent; and California, 93 percent. A large part of the alfalfa seed was also grown on irrigated lands in these States.

From data available it appears that a seeding of alfalfa is generally good for 4 to 5 years before plowing up in most States. In the North, as in Montana and Michigan, the usual period of stand is 3 to 5 years, and in the Southwest as in Arkansas, Texas, and California, the crop is usually left for 5 to 6 years.

ALL HAY: Additional labor requirements per acre if hay is baled

| State | : Additional man hours : Percentage of hay crop that was | | : per acre baling with : baled in 1939 3/ | | |
|---------------|--|----------------|---|------------------|------------------|
| | : Windrow : | | : Windrow : | | |
| | : Stationary : | : pick-up : | : All : | : Stationary : | : pick-up : |
| | : baler 1/ : | : baler 2/ : | : baling : | : baling : | : baling : |
| | : <u>Hours</u> | : <u>Hours</u> | : <u>Percent</u> | : <u>Percent</u> | : <u>Percent</u> |
| Maine | : 5.0 | : 2.0 | : 1.7 | : 1.7 | : 0 |
| New Hampshire | : 5.0 | : 2.0 | : 3.0 | : 2.7 | : 0.3 |
| Vermont | : 5.0 | : — | : 4.8 | : 4.8 | : 0 |
| Massachusetts | : 5.0 | : — | : 1.0 | : 1.0 | : 0 |
| Rhode Island | : 5.0 | : — | : .4 | : .4 | : 0 |
| Connecticut | : 5.0 | : — | : .8 | : .8 | : 0 |
| New England | : 5.0 | : 2.0 | : 2.5 | : 2.4 | : .1 |
| New York | : 4.5 | : 1.5 | : 7.0 | : 6.7 | : .3 |
| New Jersey | : 5.0 | : 2.0 | : 8.0 | : 6.4 | : 1.6 |
| Pennsylvania | : 4.5 | : 1.5 | : 9.0 | : 8.4 | : .6 |
| Mid. Atlantic | : 4.5 | : 1.6 | : 7.0 | : 6.6 | : .4 |
| Ohio | : 4.5 | : 1.5 | : 9.0 | : 8.2 | : .8 |
| Indiana | : 4.5 | : 1.5 | : 8.0 | : 6.3 | : 1.7 |
| Illinois | : 4.5 | : 1.5 | : 18.0 | : 11.9 | : 6.1 |
| Michigan | : 4.5 | : 1.5 | : 4.0 | : 3.9 | : .1 |
| Wisconsin | : 5.0 | : 1.5 | : 2.0 | : 1.9 | : .1 |
| E. N. Central | : 4.5 | : 1.5 | : 7.8 | : 6.8 | : 1.0 |
| Minnesota | : 5.0 | : 1.5 | : 3.0 | : 2.7 | : .3 |
| Iowa | : 4.5 | : 1.5 | : 5.0 | : 4.0 | : 1.0 |
| Missouri | : 4.5 | : 1.5 | : 15.0 | : 13.8 | : 1.2 |
| North Dakota | : 4.0 | : 1.3 | : 3.6 | : 3.5 | : .1 |
| South Dakota | : 4.0 | : 1.3 | : 2.4 | : 2.3 | : .1 |
| Nebraska | : 4.0 | : 1.3 | : 5.0 | : 4.6 | : .4 |
| Kansas | : 4.0 | : 1.3 | : 24.0 | : 22.0 | : 2.0 |
| W. N. Central | : 4.5 | : 1.4 | : 7.2 | : 6.4 | : .7 |

- Continued -

ALL HAY: Additional labor requirements per acre if hay is baled -
Continued

| State | Additional man hours per acre baling with | | Percentage of hay crop that was baled in 1939 3/ | | |
|----------------|--|--------------------------------|---|-----------------------|------------------------------|
| | Stationary: baler 1/ | Windrow pick-up baler 2/ | All baling | Stationary: baling | Windrow pick-up baling |
| | Hours | Hours | Percent | Percent | Percent |
| Delaware | 5.0 | -- | 5.0 | 5.0 | .0 |
| Maryland | 5.0 | 2.0 | 7.0 | 6.6 | 0.4 |
| Virginia | 5.0 | 2.0 | 9.0 | 8.5 | .5 |
| West Virginia | 5.0 | 2.0 | 5.0 | 4.2 | .8 |
| North Carolina | 5.0 | 2.0 | 31.0 | 28.2 | 2.8 |
| South Carolina | 5.0 | 2.0 | 35.0 | 29.0 | 6.0 |
| Georgia | 5.0 | 2.0 | 61.0 | 50.6 | 10.4 |
| Florida | 5.0 | 2.0 | 50.0 | 38.0 | 12.0 |
| So. Atlantic | 5.0 | 2.0 | 23.3 | 20.7 | 2.6 |
| Kentucky | 5.0 | 2.0 | 31.0 | 28.5 | 2.5 |
| Tennessee | 5.0 | 2.0 | 31.0 | 29.4 | 1.6 |
| Alabama | 5.0 | 2.0 | 50.0 | 42.0 | 8.0 |
| Mississippi | 5.0 | 2.0 | 32.0 | 26.2 | 5.8 |
| E. S. Central | 5.0 | 2.0 | 34.0 | 30.6 | 3.4 |
| Arkansas | 5.0 | 2.0 | 43.0 | 37.4 | 5.6 |
| Louisiana | 5.0 | 2.0 | 29.0 | 23.8 | 5.2 |
| Oklahoma | 4.0 | 1.2 | 50.0 | 46.5 | 3.5 |
| Texas | 4.0 | 1.2 | 55.0 | 48.4 | 6.6 |
| W. S. Central | 4.2 | 1.5 | 47.3 | 42.1 | 5.2 |
| Montana | 4.0 | 1.0 | 3.0 | 2.7 | .3 |
| Idaho | 5.0 | 1.5 | 1.3 | 1.2 | .1 |
| Wyoming | 4.0 | 1.0 | 6.0 | 5.7 | .3 |
| Colorado | 4.5 | 1.2 | 6.0 | 5.3 | .2 |
| New Mexico | 4.5 | 1.2 | 37.0 | 28.5 | 8.5 |
| Arizona | 4.5 | 1.0 | 45.0 | 15.3 | 29.7 |
| Utah | 5.0 | 1.2 | 5.0 | 4.2 | .8 |
| Nevada | 4.5 | 1.0 | 13.0 | 3.7 | 4.3 |
| Mountain | 4.4 | 1.0 | 7.2 | 6.4 | .8 |

ALL HAY: Additional labor requirements if hay is baled - Continued

| State | : Additional man hours : Percentage of hay crop that | | : was baled in 1939 3/ | | |
|---------------|--|--------------|------------------------|--------------|-----------|
| | : per acre baling with | | | | |
| | : Windrow | : Stationary | : All | : Stationary | : Windrow |
| | : baler 1/ | : baler 2/ | : baling | : baling | : baling |
| | : Hours | : Hours | : Percent | : Percent | : Percent |
| Washington | : 6.0 | : 1.5 | : 15.0 | : 14.2 | : 0.8 |
| Oregon | : 5.5 | : 1.5 | : 16.0 | : 15.3 | : .7 |
| California | : 5.5 | : 1.5 | : 51.0 | : 26.5 | : 24.5 |
| Pacific | : 5.6 | : 1.5 | : 34.9 | : 25.1 | : 9.8 |
| United States | : 4.7 | : 1.6 | : 14.0 | : 12.3 | : 1.7 |

1/ From 4 to 6 man hours are usually required to bale and store an acre of hay when a stationary baling outfit is used. As most all of the hay that is baled in this way has been previously stored in stack or barn, the hours for baling and caring for the baled hay are additional to the acre requirements shown in the accompanying tables for loose hay.

2/ Windrow pick-up balers are increasing in popularity. This is not because of any saving in man hours per acre for handling hay that otherwise would be fed loose where stored, but rather to a saving in the hauling and baling operations when the hay is to be baled, or when the hay would otherwise be stored loose some distance from where it is to be fed, and to various conveniences and advantages in assembling and handling haying crews, and in storing the hay in restricted storage space. Regardless of whether the hay is stored in loose or baled form, it must be cut, gathered, hauled, and stored in barn or stack. This generally requires about the same number of man hours whether stored loose or after the pick-up baler. If it is windrow baled the field must be gone over with the baler and crew--and again to gather and haul the bales. This adds about 1 to 2 man hours to the acre requirements for handling the hay in loose form.

3/ Adapted from "Machine and Hand Methods in Crop Production." A. P. Brodell, Revised January 1942. It is believed that use of windrow pick-up balers has increased since this report was prepared.

ALSIKE CLOVER SEED: Labor requirements per acre 1/

| State | Man hours per acre | | | 1929-38 |
|--------------------|--------------------|------------|---------|----------|
| | | | | average |
| | Total <u>2/</u> | Preharvest | Harvest | yield |
| | | | | per acre |
| | Hours | Hours | Hours | Bushels |
| New York | 8.0 | 0.7 | 7.3 | 1.9 |
| Ohio | 6.5 | .7 | 5.8 | 1.6 |
| Indiana | 6.4 | .7 | 5.7 | 1.4 |
| Illinois | 6.0 | .6 | 5.4 | 1.4 |
| Michigan | 6.7 | .7 | 6.0 | 1.7 |
| Wisconsin | 6.5 | .7 | 5.8 | 1.8 |
| East North Central | 6.4 | .7 | 5.7 | 1.6 |
| Minnesota | 6.4 | .8 | 5.6 | 2.7 |
| Iowa | 5.8 | .6 | 5.2 | 1.6 |
| Missouri | 6.0 | .7 | 5.3 | 1.4 |
| West North Central | 6.3 | .8 | 5.5 | 2.5 |
| Idaho | 10.8 | 2.8 | 8.0 | 5.7 |
| Oregon | 10.0 | 2.0 | 8.0 | 3.8 |
| United States | 6.9 | 0.9 | 6.0 | 2.0 |

1/ According to the 1940 census the following percentages of the total "clover seed" acreage was irrigated: Idaho, 93 percent, and Oregon, 80 percent. The data are not given separately for alsike clover seed.

2/ Baling of clover straw not included.

CLOVER AND TIMOTHY: Labor requirements per acre 1/

| State | Hay | | | | Red clover seed: Timothy seed | | | |
|----------------|--|-------|-------|------|--|----------|-------|---------|
| | Man hours per acre | | | | 1929-38: Man 1929-38: Man 1929-38 | | | |
| | : average: | | | | : hours : average: hours : average: | | | |
| | : yield : | | | | : per acre: yield : per acre: yield | | | |
| | : Pre- : per : for har-: per : (total) : per | | | | : Total:harvest:Harvest: acre :vesting :acre 2/: 3/ : acre | | | |
| | Hours | Hours | Hours | Tons | Hours | Bushels: | Hours | Bushels |
| Maine | 8.6 | .6 | 8.0 | .97 | | | | |
| New Hampshire | 9.0 | .8 | 8.2 | 1.15 | | | | |
| Vermont | 9.3 | .8 | 8.5 | 1.21 | | | | |
| Massachusetts | 9.7 | .7 | 9.0 | 1.44 | | | | |
| Rhode Island | 9.7 | .7 | 9.0 | 1.36 | | | | |
| Connecticut | 9.6 | .6 | 9.0 | 1.40 | | | | |
| New England | 9.2 | .7 | 8.5 | 1.18 | | | | |
| New York | 8.7 | .7 | 8.0 | 1.21 | 7.2 | 1.5 | -- | -- |
| New Jersey | 8.7 | .7 | 8.0 | 1.36 | -- | -- | -- | -- |
| Pennsylvania | 8.2 | .7 | 7.5 | 1.16 | 7.0 | 1.0 | 6.6 | 2.6 |
| Mid. Atlantic | 8.5 | .7 | 7.8 | 1.19 | 7.0 | 1.2 | 6.6 | 2.6 |
| Ohio | 7.7 | .7 | 7.0 | 1.02 | 5.8 | 1.0 | 6.7 | 3.0 |
| Indiana | 7.2 | .7 | 6.5 | .97 | 5.6 | .9 | 6.3 | 3.0 |
| Illinois | 7.2 | .6 | 6.6 | 1.09 | 5.3 | .9 | 6.3 | 2.5 |
| Michigan | 7.7 | .7 | 7.0 | 1.04 | 6.0 | 1.0 | -- | -- |
| Wisconsin | 8.4 | .7 | 7.7 | 1.27 | 5.8 | 1.2 | 6.5 | 3.1 |
| E. N. Central | 7.8 | .7 | 7.1 | 1.09 | 5.7 | 1.0 | 6.4 | 2.8 |
| Minnesota | 8.8 | .8 | 8.0 | 1.21 | 5.5 | 1.4 | 6.8 | 3.7 |
| Iowa | 7.6 | .6 | 7.0 | 1.12 | 5.0 | .8 | 6.0 | 3.7 |
| Missouri | 7.5 | .7 | 6.8 | .78 | 5.2 | 1.0 | 6.5 | 3.0 |
| North Dakota | 6.5 | .5 | 6.0 | .90 | -- | -- | -- | -- |
| South Dakota | 6.4 | .4 | 6.0 | .77 | -- | -- | -- | -- |
| Nebraska | 6.6 | .4 | 6.2 | .97 | 5.2 | 1.3 | -- | -- |
| Kansas | 6.6 | .4 | 6.2 | .94 | 5.0 | .7 | -- | -- |
| W. N. Central | 7.8 | .7 | 7.1 | 1.00 | 5.1 | 1.0 | 6.2 | 3.6 |
| Delaware | 8.7 | .7 | 8.0 | 1.20 | | | | |
| Maryland | 8.7 | .7 | 8.0 | 1.12 | 7.5 | 1.4 | | |
| Virginia | 9.3 | .8 | 8.5 | 1.00 | 7.5 | 1.1 | | |
| West Virginia | 9.3 | .8 | 8.5 | .95 | -- | -- | | |
| North Carolina | 9.8 | .8 | 9.0 | .90 | -- | -- | | |
| Georgia | 9.8 | .8 | 9.0 | .96 | -- | -- | | |
| So. Atlantic | 9.2 | .8 | 8.4 | 1.02 | 7.5 | 1.3 | | |

- Continued -

CLOVER AND TIMOTHY: Labor requirements per acre 1/ - Continued

| State | Hay | | | | Red clover seed | | Timothy seed | |
|---------------|---|-------|-------|------|---------------------------------|---------|-------------------|---------|
| | : 1929-38: Man | | | | : 1929-38: Man | | : 1929-38: Man | |
| | : average: hours | | | | : average: hours | | : average: hours | |
| | : yield: per acre | | | | : yield: per acre | | : yield: per acre | |
| | : Pre- : : per : for har- : per : (total) : per | | | | : vesting : acre 2/ : 3/ : acre | | | |
| | Hours | Hours | Hours | Tons | Hours | Bushels | Hours | Bushels |
| Kentucky | 8.8 | .7 | 8.1 | .92 | 6.2 | 1.5 | | |
| Tennessee | 8.8 | .7 | 8.1 | .91 | -- | -- | | |
| Alabama | 9.8 | .8 | 9.0 | .81 | -- | -- | | |
| Mississippi | 12.0 | .8 | 11.2 | 1.24 | -- | -- | | |
| E.S. Central | 8.9 | .7 | 8.2 | .92 | 6.2 | 1.5 | | |
| Arkansas | 9.8 | .8 | 9.0 | .88 | -- | -- | | |
| Montana | 8.8 | 2.8 | 6.0 | 1.27 | -- | -- | | |
| Idaho | 9.6 | 2.8 | 6.8 | 1.36 | 9.3 | 4.6 | | |
| Wyoming | 8.0 | 3.0 | 5.0 | 1.08 | -- | -- | | |
| Colorado | 8.8 | 2.0 | 6.8 | 1.37 | -- | -- | | |
| New Mexico | 8.5 | 2.0 | 6.5 | 1.27 | -- | -- | | |
| Utah | 9.5 | 2.5 | 7.0 | 1.45 | -- | -- | | |
| Nevada | 9.0 | 2.5 | 6.5 | 1.27 | -- | -- | | |
| Mountain | 8.9 | 2.6 | 6.3 | 1.29 | 9.3 | 4.6 | | |
| Washington | 11.0 | 1.5 | 9.5 | 2.06 | 9.0 | 4/3.5 | | |
| Oregon | 9.5 | 2.0 | 7.5 | 1.58 | 8.7 | 2.3 | | |
| California | 10.8 | 3.3 | 7.5 | 1.62 | -- | -- | | |
| Pacific | 10.6 | 1.8 | 8.8 | 1.85 | 8.8 | 2.5 | | |
| United States | 8.3 | .7 | 7.6 | 1.12 | 5.8 | 1.1 | 6.3 | 3.3 |

1/ Hay stored loose. See page 22 for data on baling hay. Averages for each State, including all clover and timothy hay grown alone and together. According to the 1940 census the following percentage of total hay acreage in each State was irrigated in 1939: Montana, 72 percent; Idaho, 71 percent; Wyoming, 98 percent; Colorado, 95 percent; New Mexico, 57 percent; Utah, 98 percent; Nevada, 95 percent; Washington, 14 percent; Oregon, 50 percent; and California, 75 percent. In Idaho, 93 percent of the total "clover seed" acreage was irrigated, and in Washington and Oregon 80 percent was irrigated. The data are not given separately for red clover.

2/ Seed is usually obtained from "second crop". Labor previous to harvest has been included with the hay crop, except in irrigated areas, where the following hours for irrigation are included in the hours shown for harvesting: Idaho, 2.0; Washington, 1.8; and Oregon, 1.7.

3/ These estimates include about 0.3 of an hour of work previous to harvesting the seed crop in each State.

4/ Estimated yield.

COW PEAS: Labor requirements per acre 1/

| State | Hay | | | | Seed | | | |
|----------------|-------------|-------|---------|------|-------------|-------|---------|------------|
| | 1930-39 | | | | 1929-38 | | | |
| | average | | | | average | | | |
| | Pre-harvest | | Harvest | | Pre-harvest | | Harvest | |
| | Hours | Hours | Hours | Tons | Hours | Hours | Hours | Bushels 2/ |
| New Jersey | 18.0 | 10.0 | 8.0 | 1.37 | | | | |
| Pennsylvania | 18.5 | 10.0 | 8.5 | 1.49 | | | | |
| Mid. Atlantic | 18.0 | 10.0 | 8.0 | 1.43 | | | | |
| Ohio | 15.5 | 8.0 | 7.5 | 1.17 | | | | |
| Indiana | 12.5 | 5.5 | 7.0 | 1.22 | 17.0 | 7.0 | 10.0 | 8.8 |
| Illinois | 11.5 | 5.0 | 6.5 | 1.00 | 16.0 | 6.0 | 10.0 | 8.0 |
| E.N.Central | 12.0 | 5.0 | 7.0 | 1.03 | 16.0 | 6.0 | 10.0 | 8.1 |
| Missouri | 12.0 | 5.0 | 7.0 | .96 | 15.0 | 7.0 | 8.0 | 7.1 |
| Kansas | 7.5 | 3.0 | 4.5 | .97 | 10.8 | 3.8 | 7.0 | 6.3 |
| W.N.Central | 12.0 | 5.0 | 7.0 | .96 | 15.0 | 7.0 | 8.0 | 7.0 |
| Delaware | 17.5 | 10.0 | 7.5 | 1.11 | 65.0 | 12.0 | 53.0 | 11.0 |
| Maryland | 18.5 | 10.0 | 8.5 | 1.25 | 51.0 | 12.0 | 39.0 | 8.0 |
| Virginia | 18.5 | 10.0 | 8.5 | .98 | 55.0 | 12.0 | 43.0 | 9.0 |
| West Virginia | 21.0 | 12.0 | 9.0 | 1.26 | | | | |
| North Carolina | 22.0 | 14.0 | 8.0 | .79 | 55.0 | 18.0 | 37.0 | 7.7 |
| South Carolina | 21.0 | 13.0 | 8.0 | .74 | 46.0 | 17.0 | 29.0 | 5.7 |
| Georgia | 21.0 | 13.0 | 8.0 | .66 | 48.0 | 18.0 | 30.0 | 5.9 |
| Florida | 21.0 | 13.0 | 8.0 | .67 | 60.0 | 18.0 | 42.0 | 8.8 |
| So. Atlantic | 21.0 | 13.0 | 8.0 | .75 | 49.0 | 17.0 | 32.0 | 6.2 |
| Kentucky | 20.0 | 10.0 | 10.0 | 1.11 | 53.0 | 12.0 | 41.0 | 8.6 |
| Tennessee | 18.0 | 10.0 | 8.0 | .85 | 39.0 | 12.0 | 27.0 | 5.4 |
| Alabama | 22.0 | 13.0 | 9.0 | .78 | 45.0 | 16.0 | 29.0 | 5.7 |
| Mississippi | 22.0 | 11.0 | 11.0 | .93 | 43.0 | 15.0 | 28.0 | 5.8 |
| E.S.Central | 21.0 | 11.0 | 10.0 | .90 | 44.0 | 15.0 | 29.0 | 5.8 |
| Arkansas | 21.0 | 11.0 | 10.0 | .92 | 47.0 | 14.0 | 33.0 | 6.9 |
| Louisiana | 23.0 | 12.0 | 11.0 | 1.06 | 51.0 | 15.0 | 36.0 | 7.6 |
| Oklahoma | 14.0 | 8.0 | 6.0 | .76 | 43.0 | 11.0 | 32.0 | 6.4 |
| Texas | 12.5 | 7.5 | 5.0 | .63 | 44.5 | 11.5 | 33.0 | 7.0 |
| W.S.Central | 13.0 | 10.0 | 8.0 | .87 | 46.0 | 13.0 | 33.0 | 7.0 |
| United States | 19.0 | 11.0 | 8.0 | .84 | 43.0 | 14.0 | 29.0 | 6.4 |

1/ Hay stored loose. See page 22 for data on hay baling.

2/ Labor requirements assume that cow pea seed was harvested with a binder or mower and thresher in Indiana, Illinois, Missouri, and Kansas, and that about 80 percent of the seed harvested in the remaining States was picked by hand. An average worker can usually pick 175 pounds of pods per 10-hour day, which will turn out 120 pounds, or 2 bushels of peas. A worker will pick, thresh, clean and store about 1 3/4 bushels of peas in a 10-hour day.

GRAIN HAY: Labor requirements per acre 1/

| State | Man hours per acre | | | 1930-39 average yield per acre |
|-----------------|--------------------|------------|---------|---|
| | Total | Preharvest | Harvest | |
| | Hours | Hours | Hours | Ton |
| Maine | 21.0 | 10.0 | 11.0 | 1.92 |
| New Hampshire | 21.0 | 10.0 | 11.0 | 1.88 |
| Vermont | 21.0 | 10.0 | 11.0 | 1.78 |
| Massachusetts | 20.0 | 9.5 | 10.5 | 2.07 |
| Rhode Island | 13.5 | 9.5 | 9.0 | 1.76 |
| Connecticut | 18.5 | 9.5 | 9.0 | 1.75 |
| New England | 20.4 | 9.8 | 10.6 | 1.83 |
| New York | 16.6 | 8.6 | 8.0 | 1.58 |
| New Jersey | 14.8 | 6.8 | 8.0 | 1.52 |
| Pennsylvania | 14.6 | 7.0 | 7.6 | 1.15 |
| Middle Atlantic | 16.0 | 8.1 | 7.9 | 1.47 |
| Ohio | 12.5 | 6.0 | 6.5 | .81 |
| Indiana | 11.3 | 5.0 | 6.3 | .75 |
| Illinois | 10.5 | 4.5 | 6.0 | .73 |
| Michigan | 13.0 | 6.5 | 6.5 | .85 |
| Wisconsin | 14.0 | 6.9 | 7.1 | 1.03 |
| E. N. Central | 12.6 | 6.0 | 6.6 | .89 |
| Minnesota | 10.4 | 3.4 | 7.0 | .84 |
| Iowa | 11.0 | 4.0 | 7.0 | .96 |
| Missouri | 12.0 | 6.0 | 6.0 | .66 |
| North Dakota | 8.8 | 2.8 | 6.0 | .78 |
| South Dakota | 8.0 | 2.5 | 5.5 | .62 |
| Nebraska | 7.9 | 2.4 | 5.5 | .72 |
| Kansas | 8.3 | 2.3 | 6.0 | .82 |
| W. N. Central | 9.7 | 3.5 | 6.2 | .75 |
| Delaware | 15.0 | 7.0 | 8.0 | 1.34 |
| Maryland | 15.5 | 7.5 | 8.0 | 1.48 |
| Virginia | 16.0 | 9.0 | 7.0 | .81 |
| West Virginia | 17.0 | 10.0 | 7.0 | .77 |
| North Carolina | 18.5 | 10.0 | 8.5 | .98 |
| South Carolina | 13.5 | 10.0 | 8.5 | .74 |
| Georgia | 17.0 | 9.0 | 8.0 | .73 |
| So. Atlantic | 17.5 | 9.6 | 7.9 | .86 |

- Continued -

GRAIN HAY: Labor requirements per acre 1/ - Continued

| State | Man hours per acre | | | 1930-39 average yield per acre |
|---------------|--------------------|------------|---------|---|
| | Total | Preharvest | Harvest | |
| | Hours | Hours | Hours | Tons |
| Kentucky | 14.5 | 7.0 | 7.5 | .80 |
| Tennessee | 14.5 | 7.2 | 7.3 | .69 |
| Alabama | 18.5 | 10.0 | 8.5 | .80 |
| Mississippi | 19.0 | 10.0 | 9.0 | .92 |
| E. S. Central | 15.3 | 7.7 | 7.6 | .76 |
| Arkansas | 16.0 | 8.3 | 7.7 | .69 |
| Louisiana | 18.5 | 10.0 | 8.5 | .89 |
| Oklahoma | 9.0 | 3.8 | 5.2 | .79 |
| Texas | 10.0 | 3.5 | 6.5 | .86 |
| W. S. Central | 11.4 | 5.0 | 6.4 | .79 |
| Montana | 7.5 | 3.0 | 4.5 | .62 |
| Idaho | 10.8 | 4.8 | 6.0 | 1.21 |
| Wyoming | 8.5 | 4.0 | 4.5 | .66 |
| Colorado | 9.5 | 4.0 | 5.5 | .88 |
| New Mexico | 12.0 | 6.0 | 6.0 | 1.16 |
| Arizona | 14.5 | 8.5 | 6.0 | 1.47 |
| Utah | 14.0 | 8.2 | 5.8 | 1.11 |
| Nevada | 14.0 | 3.2 | 5.8 | 1.10 |
| Mountain | 9.5 | 4.4 | 5.1 | .81 |
| Washington | 10.5 | 4.5 | 6.0 | 1.32 |
| Oregon | 10.8 | 4.8 | 6.0 | 1.30 |
| California | 11.0 | 4.2 | 6.8 | 1.39 |
| Pacific | 10.8 | 4.4 | 6.4 | 1.35 |
| United States | 11.2 | 4.8 | 6.4 | .98 |

1/ Grains cut green for hay and stored loose. See page 22 for data on baling hay. According to the 1940 census, the percentage of the total State acreage that was irrigated in 1939 was as follows: Montana, 9 percent; Idaho, 15 percent; Wyoming, 14 percent; Colorado, 28 percent; New Mexico, 39 percent; Arizona, 71 percent; Utah, 68 percent; Nevada, 90 percent; Washington, 4 percent; Oregon, 10 percent; and California, 18 percent.

LESPEDEZA: Labor requirements per acre ^{1/}

| State | Hay | | | | Seed | |
|----------------|-----------------------------|---------|---------|-------------------|-----------------------------|-------------------|
| | 1930-39: Man hours per acre | | | | 1929-38: Man hours per acre | |
| | : average: | | | | : average | |
| | : Pre- : : yield : | | | | : for : yield | |
| | Total | harvest | Harvest | per acre | harvest | per acre |
| | Hours | Hours | Hours | Tons | Hours | Pounds |
| Indiana | | | | | 8.0 | ^{3/} 175 |
| Illinois | 7.5 | .5 | 7.0 | ^{2/} .92 | 7.5 | ^{2/} 176 |
| E. N. Central | 7.5 | .5 | 7.0 | .92 | 7.8 | 175 |
| Missouri | 7.5 | .7 | 6.8 | ^{2/} .85 | 8.0 | ^{2/} 175 |
| Kansas | | | | | 7.5 | ^{3/} 185 |
| W. N. Central | 7.5 | .7 | 6.8 | .85 | 8.0 | 178 |
| Virginia | 8.4 | 1.0 | 7.4 | ^{2/} .94 | 8.5 | ^{2/} 256 |
| North Carolina | 10.0 | 1.0 | 9.0 | .93 | 9.0 | 156 |
| South Carolina | 9.0 | 1.0 | 8.0 | .73 | 9.5 | ^{3/} 200 |
| Georgia | 10.0 | 1.0 | 9.0 | .87 | 9.5 | ^{3/} 200 |
| So. Atlantic | 9.4 | 1.0 | 8.4 | .90 | 9.1 | 183 |
| Kentucky | 9.2 | .7 | 8.5 | 1.06 | 9.0 | 168 |
| Tennessee | 9.0 | .7 | 8.3 | .95 | 9.0 | 163 |
| Alabama | 10.0 | 1.0 | 9.0 | .82 | 9.5 | ^{3/} 200 |
| Mississippi | 11.0 | 1.0 | 10.0 | 1.11 | 9.0 | 96 |
| E. S. Central | 9.3 | .7 | 8.6 | 1.00 | 9.0 | 168 |
| Arkansas | 10.0 | 1.0 | 9.0 | .93 | 9.5 | ^{3/} 175 |
| Louisiana | 11.0 | 1.0 | 10.0 | 1.10 | 9.0 | 105 |
| W. S. Central | 10.2 | 1.0 | 9.2 | .98 | 9.4 | 161 |
| United States | 8.9 | .8 | 8.1 | .96 | 8.7 | 175 |

^{1/} Hay stored loose. See page 22 for data on hay baling.

^{2/} Short-time averages.

^{3/} For 1939 only.

SOY BEANS: Labor requirements per acre 1/

| State | Hay | | | | Beans | | | |
|----------------|--------------------|-------------------|----------------|-------------------|--------------------|-------------------|----------------|-------------------|
| | Man hours per acre | | :1930-39 | | Man hours per acre | | :1929-38 | |
| | | | :average | | | | :average | |
| | : Pre- | : yield | : Pre- | : yield | : Pre- | : yield | : Pre- | : yield |
| | Total:harvest: | Harvest:per acre: | Total:harvest: | Harvest:per acre: | Total:harvest: | Harvest:per acre: | Total:harvest: | Harvest:per acre: |
| | :Hours | Hours | Hours | Tons | :Hours | Hours | Hours | Bushels |
| New York | : 19.0 | 11.0 | 8.0 | 1.54 | : 19.0 | 13.0 | 6.0 | 2/ 14.9 |
| New Jersey | : 18.0 | 10.0 | 8.0 | 1.44 | : 19.0 | 12.0 | 7.0 | 2/ 17.0 |
| Pennsylvania | : 18.0 | 10.0 | 8.0 | 1.48 | : 17.0 | 11.0 | 6.0 | 2/ 16.3 |
| Mid. Atlantic | : 18.0 | 10.0 | 8.0 | 1.48 | : 18.0 | 12.0 | 6.0 | 16.4 |
| Ohio | : 16.0 | 8.0 | 8.0 | 1.31 | : 14.0 | 9.0 | 5.0 | 17.4 |
| Indiana | : 12.5 | 5.5 | 7.0 | 1.34 | : 11.0 | 7.0 | 4.0 | 16.2 |
| Illinois | : 12.0 | 5.0 | 7.0 | 1.40 | : 9.5 | 6.0 | 3.5 | 18.4 |
| Michigan | : 13.5 | 6.0 | 7.5 | 1.31 | : 12.5 | 7.5 | 5.0 | 12.4 |
| Wisconsin | : 13.5 | 6.0 | 7.5 | 1.43 | : 12.5 | 7.5 | 5.0 | 12.0 |
| E.N.Central | : 13.0 | 6.0 | 7.0 | 1.37 | : 11.0 | 7.0 | 4.0 | 17.8 |
| Minnesota | : 13.0 | 5.5 | 7.5 | 2/ 1.70 | : 11.0 | 7.0 | 4.0 | 2/ 17.0 |
| Iowa | : 12.0 | 5.0 | 7.0 | 1.37 | : 10.0 | 6.0 | 4.0 | 16.4 |
| Missouri | : 12.0 | 5.0 | 7.0 | 1.08 | : 11.5 | 7.0 | 4.5 | 8.0 |
| Nebraska | : 9.0 | 3.0 | 5.0 | 1.04 | : - | - | - | - |
| Kansas | : 7.5 | 3.0 | 4.5 | 1.02 | : 6.8 | 3.8 | 3.0 | 7.5 |
| W.N.Central | : 12.0 | 5.0 | 7.0 | 1.33 | : 10.0 | 6.0 | 4.0 | 13.5 |
| Delaware | : 18.0 | 10.0 | 8.0 | 1.26 | : 19.0 | 12.0 | 7.0 | 13.4 |
| Maryland | : 18.0 | 10.0 | 8.0 | 1.32 | : 19.0 | 12.0 | 7.0 | 12.5 |
| Virginia | : 18.0 | 10.0 | 8.0 | 1.09 | : 19.0 | 12.0 | 7.0 | 12.0 |
| West Virginia | : 21.0 | 12.0 | 9.0 | 1.31 | : 22.0 | 14.0 | 8.0 | 11.6 |
| North Carolina | : 24.0 | 14.0 | 10.0 | .97 | : 24.0 | 18.0 | 6.0 | 12.4 |
| South Carolina | : 22.0 | 13.0 | 9.0 | .82 | : 23.0 | 17.0 | 6.0 | 6.4 |
| Georgia | : 22.0 | 13.0 | 9.0 | .86 | : 24.0 | 18.0 | 6.0 | 5.8 |
| So. Atlantic | : 22.0 | 13.0 | 9.0 | 1.03 | : 22.0 | 16.0 | 6.0 | 11.8 |
| Kentucky | : 20.0 | 10.0 | 10.0 | 1.22 | : 18.0 | 12.0 | 6.0 | 10.2 |
| Tennessee | : 19.0 | 10.0 | 9.0 | .98 | : 19.0 | 12.0 | 7.0 | 7.3 |
| Alabama | : 22.0 | 13.0 | 9.0 | .92 | : 23.0 | 16.0 | 7.0 | 5.7 |
| Mississippi | : 23.0 | 11.0 | 12.0 | 1.18 | : 21.0 | 15.0 | 6.0 | 8.2 |
| E.S.Central | : 21.0 | 11.0 | 10.0 | 1.07 | : 20.0 | 14.0 | 6.0 | 7.8 |

- Continued -

SOYBEANS: Labor requirements per acre 1/ - Continued

| State | Hay | | | | Beans | | | |
|---------------|--------------------|----------|-----------|-----------|--------------------|----------|-----------|-----------|
| | Man hours per acre | | : 1930-39 | | Man hours per acre | | : 1929-38 | |
| | | | : average | | | | : average | |
| | : Pre- | | : yield | | : Pre- | | : yield | |
| | Total: | harvest: | Harvest: | per acre: | Total: | harvest: | Harvest: | per acre: |
| | Hours | Hours | Hours | Tons | Hours | Hours | Hours | Bushels |
| Arkansas | 20.0 | 11.0 | 9.0 | .98 | 20.0 | 14.0 | 6.0 | 8.6 |
| Louisiana | 24.0 | 12.0 | 12.0 | 1.16 | 22.0 | 15.0 | 7.0 | 8.0 |
| Oklahoma | 13.0 | 8.0 | 5.0 | .81 | 16.0 | 11.0 | 5.0 | 8.4 |
| Texas | 12.0 | 7.5 | 4.5 | 2/ 1.62 | 15.0 | 10.5 | 4.5 | 2/ 7.6 |
| W. S. Central | 21.0 | 11.0 | 10.0 | 1.01 | 20.0 | 14.0 | 6.0 | 8.3 |
| United States | 16.0 | 8.0 | 8.0 | 1.25 | 12.0 | 8.0 | 4.0 | 15.7 |

1/ Hay stored loose. See page 22 for data on hay baling. Soy beans for hay are planted mostly solid in the Corn Belt and mostly in rows in the South. If the crop is for beans, about one-half is seeded in rows in the Corn Belt, and all are seeded in rows in the South. Most of the crop is harvested with combines, although old methods are used to some extent in some areas. It takes from $2\frac{1}{2}$ to $3\frac{1}{2}$ hours, on the average, to combine and haul to storage one acre of beans. In most States it takes from 8 to 12 hours per acre to cut with binder, thresh, and haul to storage.

2/ Short-time average.

SWEET CLOVER: Labor requirements per acre 1/

| State | Hay | | | | Seed | | | |
|---------------|------------------------------|----------|-----------|----------------|------------------------------|-----------|----------------|---------------|
| | Man hours per acre : 1930-39 | | | | Man hours per acre : 1929-38 | | | |
| | : average : | | | | : average : | | | |
| | : Pre- : : yield : | | | | : Pre- : : yield : | | | |
| | Total:harvest: | Harvest: | per acre: | Total:harvest: | Harvest: | per acre: | Total:harvest: | Harvest: |
| | Hours | Hours | Hours | Tons | Hours | Hours | Hours | Bushels |
| Ohio | : 8.0 | 1.0 | 7.0 | 1.06 | : 8.0 | 1.0 | 7.0 | 2.5 |
| Indiana | : 8.0 | 1.0 | 7.0 | 1.05 | : 8.0 | 1.0 | 7.0 | 2.4 |
| Illinois | : 7.6 | 1.0 | 6.6 | 1.20 | : 7.6 | 1.0 | 6.6 | 2.6 |
| Michigan | : 8.5 | 1.0 | 7.5 | 1.12 | : 8.0 | 1.0 | 7.0 | <u>2/</u> 3.0 |
| Wisconsin | : 9.0 | 1.0 | 8.0 | 1.45 | : 8.0 | 1.0 | 7.0 | <u>2/</u> 3.4 |
| E. N. Central | : 8.5 | 1.0 | 7.5 | 1.22 | : 7.8 | 1.0 | 6.8 | 2.6 |
| Minnesota | : 8.5 | 1.0 | 7.5 | 1.18 | : 7.8 | 1.0 | 6.8 | 4.0 |
| Iowa | : 7.0 | .7 | 6.3 | 1.07 | : 7.0 | .7 | 6.3 | 2.7 |
| Missouri | : 7.5 | .7 | 6.8 | 1.02 | : 7.5 | .7 | 6.8 | 2.4 |
| North Dakota | : 7.0 | .8 | 6.2 | 1.04 | : 7.0 | .8 | 6.2 | 3.2 |
| South Dakota | : 6.8 | .8 | 6.0 | .86 | : 7.0 | .8 | 6.2 | 2.8 |
| Nebraska | : 7.0 | .8 | 6.2 | .88 | : 7.0 | .8 | 6.2 | 2.8 |
| Kansas | : 7.0 | .8 | 6.2 | .96 | : 7.0 | .8 | 6.2 | 2.5 |
| W. N. Central | : 7.5 | .9 | 6.6 | 1.07 | : 7.3 | .8 | 6.5 | 3.3 |
| Montana | : 7.5 | 1.2 | 6.3 | .90 | : 8.0 | 1.2 | 6.8 | 2.4 |
| Wyoming | : 8.0 | 2.0 | 6.0 | 1.16 | : 8.0 | 1.5 | 6.5 | <u>2/</u> 3.3 |
| Colorado | : 8.0 | 2.0 | 6.0 | 1.05 | : 8.0 | 1.5 | 6.5 | 4.1 |
| Mountain | : 7.7 | 1.5 | 6.2 | .97 | : 8.0 | 1.3 | 6.7 | 3.0 |
| United States | : 7.7 | 1.0 | 6.7 | 1.09 | : 7.4 | .9 | 6.5 | 3.2 |

1/ Hay stored loose. See page 22 for data on hay baling. According to the 1940 census, the following percentage of the State total sweet clover hay acreage was irrigated in 1939: Montana, 14 percent; Wyoming, 77 percent; Colorado, 90 percent. The percentage of the seed acreage that was irrigated was 41 in Montana, 98 in Wyoming, and 99 in Colorado. Preharvest labor was split about half and half between hay and seed.

2/ Short-time average.

SWEET SORGHUM HAY: Labor requirements per acre ^{1/}

| State | Man hours per acre | | | 1930-39 |
|----------------|--------------------|-------------|---------|----------|
| | | | | average |
| | | | | yield |
| | Total | Pre-harvest | Harvest | per acre |
| | Hours | Hours | Hours | Tons |
| Illinois | 16.0 | 6.0 | 10.0 | 2/ 2.50 |
| Iowa | 17.0 | 6.0 | 11.0 | 3.06 |
| Missouri | 17.0 | 7.0 | 10.0 | 1.72 |
| North Dakota | 11.0 | 4.0 | 7.0 | 2/ 1.65 |
| South Dakota | 11.0 | 4.0 | 7.0 | 1.49 |
| Nebraska | 12.0 | 4.0 | 8.0 | 1.58 |
| Kansas | 12.0 | 4.0 | 8.0 | 1.68 |
| W. N. Central | 12.1 | 4.2 | 7.9 | 1.63 |
| Virginia | 22.0 | 12.0 | 10.0 | 1.50 |
| North Carolina | 25.0 | 14.0 | 11.0 | 1.58 |
| South Carolina | 25.0 | 14.0 | 11.0 | 1.62 |
| Georgia | 24.0 | 14.0 | 10.0 | 1.21 |
| So. Atlantic | 24.3 | 13.9 | 10.4 | 1.40 |
| Kentucky | 22.0 | 10.0 | 12.0 | 2.40 |
| Tennessee | 22.0 | 10.0 | 12.0 | 1.94 |
| Alabama | 26.0 | 14.0 | 12.0 | 1.41 |
| Mississippi | 26.0 | 14.0 | 12.0 | 1.69 |
| E. S. Central | 24.0 | 12.0 | 12.0 | 1.90 |
| Arkansas | 25.0 | 14.0 | 11.0 | 1.39 |
| Louisiana | 26.0 | 14.0 | 12.0 | 1.64 |
| Oklahoma | 17.0 | 10.0 | 7.0 | 1.16 |
| Texas | 15.0 | 8.0 | 7.0 | 1.14 |
| W. S. Central | 15.8 | 8.7 | 7.1 | 1.16 |
| Colorado | 12.0 | 6.0 | 6.0 | .86 |
| New Mexico | 10.5 | 4.5 | 6.0 | .80 |
| Mountain | 11.7 | 5.7 | 6.0 | .85 |
| United States | 14.0 | 6.3 | 7.7 | 1.44 |

^{1/} Hay stored loose. See page 22 for data on hay baling.

^{2/} Yields are for 1940. Percentage of State total acreage that was irrigated in 1939, according to 1940 census: Texas, 2 percent; Colorado, 6 percent; and New Mexico, 10 percent.

VELVET BEANS: Labor requirements per acre 1/

| State | Man hours per acre | | | 1929-38 |
|--------------------|--------------------|-------------|---------|----------|
| | | | | average |
| | | | | yield |
| | Total | Pre-harvest | Harvest | per acre |
| | | | | 2/ |
| | Hours | Hours | Hours | Pounds |
| South Carolina | 42 | 10 | 32 | 997 |
| Georgia | 37 | 10 | 27 | 837 |
| Florida | 31 | 10 | 21 | 653 |
| South Atlantic | 37 | 10 | 27 | 822 |
| Alabama | 36 | 10 | 26 | 797 |
| Mississippi | 43 | 10 | 33 | 1,058 |
| East South Central | 37 | 10 | 27 | 833 |
| Louisiana | 37 | 10 | 27 | 802 |
| United States | 37 | 10 | 27 | 824 |

1/ For velvet beans grown alone. Approximately 95 to 95 percent of the acreage is interplanted with other crops, especially corn. Probably 90 to 95 percent of the acreage is grazed.

The labor shown for harvest represents the hours that would be required if the total yield of beans was picked and threshed. However, on the average only about 1 to 2½ bushels of beans per acre are harvested. From 90 to 100 pounds of pods are required to produce one bushel of shelled beans (60 pounds).

If harvested for hay, about 8 hours per acre are required for harvesting and storing the hay loose. See page 22 for data on hay baling.

2/ Yields refer to the entire production of beans in the hull, whether grazed or harvested otherwise.

WILD HAY: Labor requirements per acre 1/

| State | Man hours per acre | | | 1929-38 |
|--------------------|--------------------|-------------|---------|----------------|
| | | | | average |
| | Total | Pre-harvest | Harvest | yield per acre |
| | Hours | Hours | Hours | Tons |
| Maine | 6.6 | — | 6.6 | .93 |
| New Hampshire | 6.6 | — | 6.6 | .90 |
| Vermont | 6.8 | — | 6.8 | .90 |
| Massachusetts | 6.6 | — | 6.6 | .93 |
| Rhode Island | 6.4 | — | 6.4 | .85 |
| Connecticut | 6.6 | — | 6.6 | 1.08 |
| New England | 6.6 | — | 6.6 | .95 |
| New York | 6.8 | — | 6.8 | .90 |
| New Jersey | 6.8 | — | 6.8 | 1.24 |
| Pennsylvania | 6.6 | — | 6.6 | .79 |
| Middle Atlantic | 6.8 | — | 6.8 | .94 |
| Ohio | 6.6 | — | 6.6 | .72 |
| Indiana | 6.4 | — | 6.4 | .88 |
| Illinois | 6.2 | — | 6.2 | .82 |
| Michigan | 6.4 | — | 6.4 | .81 |
| Wisconsin | 6.4 | — | 6.4 | .98 |
| East North Central | 6.4 | — | 6.4 | .95 |
| Minnesota | 6.4 | — | 6.4 | .90 |
| Iowa | 5.4 | — | 5.4 | .98 |
| Missouri | 5.6 | — | 5.6 | .94 |
| North Dakota | 4.8 | — | 4.8 | .71 |
| South Dakota | 4.4 | — | 4.4 | .52 |
| Nebraska | 4.6 | — | 4.6 | .63 |
| Kansas | 5.4 | — | 5.4 | .85 |
| West North Central | 5.0 | — | 5.0 | .71 |
| Delaware | 6.8 | — | 6.8 | 1.05 |
| Maryland | 6.6 | — | 6.6 | .86 |
| Virginia | 6.6 | — | 6.6 | .76 |
| West Virginia | 6.6 | — | 6.6 | .76 |
| North Carolina | 8.0 | — | 8.0 | .95 |
| South Carolina | 8.0 | — | 8.0 | .76 |
| Georgia | 8.0 | — | 8.0 | .78 |
| Florida | 7.6 | — | 7.6 | .68 |
| South Atlantic | 7.6 | — | 7.6 | .83 |

- Continued -

WILD HAY: Labor requirements per acre 1/ - Continued

| State | Man hours per acre | | | 1929-38 |
|--------------------|--------------------|-------------|---------|----------------|
| | | | | average |
| | Total | Pre-harvest | Harvest | yield per acre |
| | Hours | Hours | Hours | Tons |
| Kentucky | 6.8 | — | 6.8 | .90 |
| Tennessee | 7.0 | — | 7.0 | .75 |
| Alabama | 8.2 | — | 8.2 | .80 |
| Mississippi | 8.2 | — | 8.2 | .98 |
| East South Central | 7.7 | — | 7.7 | .87 |
| Arkansas | 8.0 | — | 8.0 | .94 |
| Louisiana | 8.2 | — | 8.2 | 1.00 |
| Oklahoma | 5.4 | — | 5.4 | .85 |
| Texas | 5.2 | — | 5.2 | .90 |
| West South Central | 5.8 | — | 5.8 | .88 |
| Montana | 5.6 | 1.0 | 4.6 | .76 |
| Idaho | 5.8 | 1.2 | 4.6 | .96 |
| Wyoming | 5.8 | 1.2 | 4.6 | .68 |
| Colorado | 6.6 | 1.2 | 5.4 | .92 |
| New Mexico | 5.7 | .5 | 5.2 | .74 |
| Arizona | 5.6 | .4 | 5.2 | .98 |
| Utah | 6.6 | 1.2 | 5.4 | 1.04 |
| Nevada | 6.4 | 1.2 | 5.2 | .98 |
| Mountain | 6.0 | 1.1 | 4.9 | .83 |
| Washington | 5.5 | .3 | 5.2 | 1.18 |
| Oregon | 5.4 | 1.0 | 4.4 | 1.00 |
| California | 5.7 | .5 | 5.2 | 1.10 |
| Pacific | 5.5 | .7 | 4.8 | 1.05 |
| United States | 5.3 | .2 | 5.1 | .76 |

1/ Hay stored loose. See page 22 for data on hay baling. According to the 1940 census, the following percentage of the State total acreage was irrigated in 1939: Montana, 50 percent; Idaho, 75 percent; Wyoming, 85 percent; Colorado, 85 percent; New Mexico, 27 percent; Arizona, 25 percent; Utah, 85 percent; Nevada, 90 percent; Washington, 10 percent; Oregon, 82 percent; California, 50 percent.

APPLES: Labor requirements per acre 1/

| State | Bearing orchards | | | | Nonbearing orchards | | |
|----------------|--------------------|-------|-----------|---------|---------------------|----------|-----------------|
| | Man hours per acre | | : 1938-41 | | Number of trees | | Total man hours |
| | : | : | average | : | per acre | per acre | per acre |
| | : Pre-harvest | | yield | : | per acre | per acre | per acre |
| | : Total | | Harvest | : | per acre | per acre | per acre |
| | Hours | Hours | Hours | Bushels | Trees | Trees | Hours |
| Maine | 110 | 50 | 60 | 80 | 40 | 48 | 25 |
| New Hampshire | 105 | 50 | 55 | 73 | 40 | 48 | 25 |
| Vermont | 110 | 50 | 60 | 82 | 40 | 48 | 25 |
| Massachusetts | 120 | 50 | 70 | 91 | 40 | 48 | 25 |
| Rhode Island | 110 | 50 | 60 | 80 | 40 | 48 | 25 |
| Connecticut | 140 | 50 | 90 | 121 | 40 | 48 | 25 |
| New England | 118 | 50 | 68 | 90 | 40 | 48 | 25 |
| New York | 105 | 45 | 60 | 117 | 36 | 42 | 28 |
| New Jersey | 125 | 55 | 70 | 143 | 55 | 60 | 30 |
| Pennsylvania | 105 | 55 | 50 | 99 | 38 | 45 | 28 |
| Mid. Atlantic | 106 | 50 | 56 | 111 | 38 | 44 | 28 |
| Ohio | 90 | 50 | 40 | 86 | 38 | 45 | 28 |
| Indiana | 90 | 50 | 40 | 85 | 40 | 46 | 25 |
| Illinois | 85 | 50 | 35 | 82 | 44 | 50 | 25 |
| Michigan | 85 | 45 | 40 | 85 | 38 | 45 | 25 |
| Wisconsin | 80 | 45 | 35 | 76 | 60 | 65 | 25 |
| E.N. Central | 87 | 48 | 39 | 84 | 41 | 41 | 26 |
| Minnesota | 95 | 45 | 50 | 112 | 55 | 60 | 22 |
| Iowa | 90 | 45 | 45 | 86 | 44 | 50 | 25 |
| Missouri | 85 | 55 | 30 | 53 | 44 | 50 | 30 |
| North Dakota | 65 | 45 | 20 | 36 | 60 | 65 | 25 |
| South Dakota | 65 | 45 | 20 | 35 | 60 | 65 | 25 |
| Nebraska | 95 | 45 | 50 | 97 | 46 | 50 | 30 |
| Kansas | 85 | 45 | 40 | 82 | 46 | 50 | 30 |
| W.N. Central | 87 | 50 | 37 | 71 | 46 | 52 | 27 |
| Delaware | 110 | 55 | 55 | 113 | 48 | 54 | 30 |
| Maryland | 95 | 50 | 45 | 113 | 46 | 52 | 28 |
| Virginia | 100 | 50 | 50 | 102 | 40 | 46 | 28 |
| West Virginia | 95 | 50 | 45 | 71 | 38 | 45 | 28 |
| North Carolina | 85 | 55 | 30 | 64 | 45 | 50 | 30 |
| South Carolina | 80 | 55 | 25 | 50 | 45 | 50 | 30 |
| Georgia | 90 | 55 | 35 | 72 | 50 | 55 | 30 |
| Florida | 80 | 50 | 30 | 65 | 60 | 65 | 30 |
| So. Atlantic | 95 | 51 | 44 | 85 | 42 | 48 | 29 |

- Continued -

APPLES: Labor requirements per acre 1/ - Continued

| State | Bearing orchards | | | | Nonbearing orchards | | |
|---------------|--------------------|----------|----------|-----------|---------------------|-------|---------|
| | Man hours per acre | | Number | | Number | | Total |
| | : 1938-41 | | : of | | : of | | : man |
| | : average | | : trees | | : trees | | : hours |
| | : Pre- | | : yield | | : per | | : per |
| | Total: | harvest: | Harvest: | per acre: | acre | acre | acre |
| | Hours | Hours | Hours | Bushels | Trees | Trees | Hours |
| Kentucky | 80 | 50 | 30 | 46 | 46 | 52 | 25 |
| Tennessee | 80 | 50 | 30 | 47 | 46 | 52 | 25 |
| Alabama | 80 | 55 | 25 | 43 | 45 | 50 | 30 |
| Mississippi | 85 | 55 | 30 | 48 | 45 | 50 | 30 |
| E.S.Central | 80 | 51 | 29 | 46 | 46 | 51 | 26 |
| Arkansas | 80 | 55 | 25 | 38 | 46 | 52 | 25 |
| Louisiana | 80 | 55 | 25 | 40 | 45 | 50 | 30 |
| Oklahoma | 70 | 50 | 20 | 35 | 46 | 52 | 20 |
| Texas | 75 | 50 | 25 | 41 | 50 | 55 | 20 |
| W.S.Central | 78 | 54 | 24 | 38 | 46 | 52 | 23 |
| Montana | 115 | 60 | 55 | 111 | 60 | 65 | 50 |
| Idaho | 345 | 210 | 135 | 290 | 55 | 60 | 80 |
| Wyoming | 95 | 55 | 40 | 82 | 60 | 65 | 28 |
| Colorado | 210 | 115 | 95 | 190 | 60 | 65 | 65 |
| New Mexico | 125 | 60 | 65 | 132 | 60 | 65 | 30 |
| Arizona | 95 | 55 | 40 | 80 | 60 | 65 | 35 |
| Utah | 155 | 80 | 75 | 158 | 65 | 70 | 30 |
| Nevada | 100 | 55 | 45 | 85 | 60 | 65 | 35 |
| Mountain | 202 | 113 | 89 | 183 | 57 | 65 | 43 |
| Washington | 540 | 260 | 280 | 438 | 60 | 65 | 100 |
| Oregon | 280 | 140 | 140 | 216 | 55 | 60 | 75 |
| California | 290 | 180 | 110 | 252 | 60 | 65 | 50 |
| Pacific | 422 | 216 | 206 | 345 | 59 | 64 | 78 |
| United States | 123 | 65 | 58 | 108 | 41 | 48 | 29 |

1/ Harvest labor includes time for packing apples in central packing houses, as well as on the farm. It was estimated that about 25 percent of the apples in Montana, Idaho, Colorado, New Mexico, and Utah are packed in central packing houses. In Washington and Oregon about 60 percent, and in California, 20 percent, are handled in central packing houses. In the new England States it generally takes about 0.75 hour to pick, pack, and market one bushel of apples. In the East South Central States and the West South Central States, the average per bushel ranges generally from 0.60 to 0.64 hour; in the remaining States the average is from 0.40 to 0.50 hour per bushel.

APRICOTS: Labor requirements per acre 1/

| State | Bearing orchards | | | | Nonbearing orchards | | |
|---------------|--------------------|----------|----------|----------|---------------------|-----------|-------|
| | Man hours per acre | | 1939 | Number | Number | Total | |
| | | | yield: | of trees | of trees | man hours | |
| | Pre- | Harvest: | per | per | per | per | |
| | Total: | harvest: | Harvest: | acre | acre | acre | acre |
| | Hours | Hours | Hours | Bushels | Trees | Trees | Hours |
| Illinois | : 90 | 40 | 50 | 35 | 80 | 90 | 20 |
| Nebraska | : 82 | 40 | 42 | 70 | 80 | 90 | 20 |
| Kansas | : 70 | 40 | 30 | 40 | 80 | 90 | 20 |
| W.N. Central | : 74 | 40 | 34 | 51 | 80 | 90 | 20 |
| Oklahoma | : 50 | 30 | 20 | 30 | 80 | 90 | 25 |
| Texas | : 55 | 30 | 25 | 35 | 80 | 90 | 20 |
| W.S. Central | : 53 | 30 | 23 | 33 | 80 | 90 | 22 |
| Idaho | : 170 | 100 | 70 | 140 | 80 | 90 | 40 |
| Colorado | : 195 | 110 | 85 | 180 | 80 | 90 | 45 |
| Utah | : 170 | 90 | 80 | 160 | 80 | 90 | 35 |
| Mountain | : 175 | 95 | 79 | 161 | 80 | 90 | 39 |
| Washington | : 205 | 120 | 85 | 2/173 | 90 | 100 | 40 |
| Oregon | : 185 | 100 | 85 | 166 | 60 | 70 | 40 |
| California | : 210 | 115 | 95 | 2/127 | 75 | 80 | 45 |
| Pacific | : 210 | 115 | 95 | 129 | 75 | 81 | 44 |
| United States | : 207 | 114 | 93 | 129 | 76 | 83 | 41 |

1/ Although the census reports apricot production in most States, the commercial production is concentrated in California and Washington. About 85 percent of the Washington production is sold in fresh state, and about 68 percent of the California production is sun dried and 32 percent is canned and sold fresh.

Labor estimates for States in addition to Washington and California that reported more than 100 acres each in 1939 are shown here. It usually takes from 0.5 to 0.6 of an hour to pick, pack, and haul a bushel of apricots sold fresh or canned. In California, where a large percentage of the crop is sun dried, the average is between 0.7 and 0.8 of an hour per bushel.

2/ Average for 1938-41.

AVOCADOS: Labor requirements per acre 1/

| State | Bearing orchards | | | | Nonbearing orchards | | |
|---------------|--------------------|---------|----------|----------|--------------------------|--------------------------|--------------------------|
| | Man hours per acre | 1938-41 | average | yield | Number of trees per acre | Number of trees per acre | Total man hours per acre |
| | Pre-harvest | Harvest | per acre | per acre | per acre | per acre | per acre |
| | Hours | Hours | Hours | Pounds | Trees | Trees | Hours |
| Florida | 70 | 30 | 40 | 2,780 | 70 | 75 | 25 |
| California | 85 | 55 | 30 | 1,980 | 70 | 75 | 50 |
| United States | 84 | 53 | 31 | 2,176 | 70 | 75 | 37 |

1/ It requires about 1.5 hours to pick and haul 100 pounds of avocados. The packing is done in packing plants and requires additional labor. For converting number of trees to acres it is assumed that young orchards have a fuller stand of trees than have the older orchards.

CHERRIES: Labor requirements per acre 1/

| State | Bearing orchards | | | | | | | :Nonbearing | | |
|----------------|------------------|-------|----------|----------|----------------|----------|-------|-------------|---------|-------|
| | | | | | | | | : orchard | | |
| | Man hours | : | : | : | : | : | : | Num-ber | Num-ber | : |
| | per acre | : | Yield | : | Domi-:centage: | ber | ber | :Total | | |
| | | : | per | : | nant | of crop: | of | of | of | hours |
| | Pre- | : | Har- | : | acre | type | pro- | trees: | trees: | per |
| | Total: | : | harvest: | : | vest: | 2/ | : | cessed | : | per |
| | : | : | : | : | : | : | : | 3/ | : | per |
| | : | : | : | : | : | : | : | acre: | acre: | : |
| | Hours | Hours | Hours | Pounds | Type | Percent | Trees | Trees | Hours | |
| New York | : 160 | 25 | 135 | 4/ 3,035 | Sour | 86 | 80 | 90 | 20 | |
| New Jersey | : 115 | 25 | 90 | 1,475 | Sour | 5/ | 80 | 90 | 20 | |
| Pennsylvania | : 130 | 30 | 100 | 4/ 1,855 | Sour | 73 | 80 | 90 | 20 | |
| Mid. Atlantic | : 149 | 27 | 122 | 2,594 | Sour | — | 80 | 90 | 20 | |
| Ohio | : 110 | 25 | 85 | 4/ 1,696 | Sour | 53 | 80 | 90 | 20 | |
| Indiana | : 110 | 25 | 85 | 1,552 | Sour | 5/ | 80 | 90 | 20 | |
| Illinois | : 90 | 25 | 65 | 1,109 | Sour | 5/ | 80 | 90 | 20 | |
| Michigan | : 135 | 25 | 110 | 4/ 2,492 | Sour | 92 | 80 | 90 | 20 | |
| Wisconsin | : 110 | 25 | 85 | 4/ 1,723 | Sour | 82 | 80 | 90 | 20 | |
| E.N.Central | : 125 | 25 | 100 | 2,177 | Sour | — | 80 | 90 | 20 | |
| Minnesota | : 60 | 25 | 35 | 439 | Sour | 5/ | 80 | 90 | 20 | |
| Iowa | : 105 | 25 | 80 | 1,433 | Sour | 5/ | 80 | 90 | 20 | |
| Missouri | : 80 | 30 | 50 | 837 | Sour | 5/ | 80 | 90 | 25 | |
| South Dakota | : 50 | 20 | 30 | 406 | Sour | 5/ | 80 | 90 | 15 | |
| Nebraska | : 85 | 25 | 60 | 1,022 | Sour | 5/ | 80 | 90 | 20 | |
| Kansas | : 85 | 25 | 60 | 1,026 | Sour | 5/ | 80 | 90 | 20 | |
| W.N.Central | : 87 | 27 | 60 | 1,039 | Sour | — | 80 | 90 | 22 | |
| Delaware | : 60 | 25 | 35 | 486 | Sour | 5/ | 80 | 90 | 20 | |
| Maryland | : 95 | 25 | 70 | 1,109 | Sour | 5/ | 80 | 90 | 20 | |
| Virginia | : 85 | 25 | 60 | 929 | Sour | 5/ | 80 | 90 | 20 | |
| West Virginia | : 65 | 25 | 40 | 531 | Sour | 5/ | 80 | 90 | 20 | |
| North Carolina | : 105 | 30 | 75 | 1,262 | Sour | 5/ | 80 | 90 | 25 | |
| South Carolina | : 120 | 30 | 90 | 1,478 | Sour | 5/ | 80 | 90 | 25 | |
| Georgia | : 95 | 30 | 65 | 1,047 | Sour | 5/ | 80 | 90 | 25 | |
| So. Atlantic | : 87 | 27 | 60 | 932 | Sour | — | 80 | 90 | 22 | |
| Kentucky | : 70 | 25 | 45 | 608 | Sour | 5/ | 80 | 90 | 20 | |
| Tennessee | : 90 | 25 | 65 | 985 | Sour | 5/ | 80 | 90 | 20 | |
| Alabama | : 120 | 30 | 90 | 1,535 | Sour | 5/ | 80 | 90 | 25 | |
| Mississippi | : 125 | 25 | 100 | 1,686 | Sour | 5/ | 80 | 90 | 20 | |
| E.S.Central | : 85 | 25 | 60 | 892 | Sour | — | 80 | 90 | 20 | |

- Continued -

CHERRIES: Labor requirements per acre 1/ - Continued

| State | Bearing orchards | | | | | Nonbearing orchard | | | |
|----------------|-----------------------|----------------------|-----------------|-----------------|-----------------------------------|--|---|---|-------------------------------|
| | Man hours per acre | Yield per acre | Pre- harvest | Har- vest | Dom- inant type | Per- centage of crop pro- cessed | Num- ber of trees per acre | Num- ber of trees per acre | Total hours per acre |
| | Hours | Hours | Hours | Pounds | Type | Percent | Trees | Trees | Hours |
| Arkansas | 90 | 30 | 60 | 894 | Sour | <u>5/</u> | 80 | 90 | 25 |
| Louisiana | 90 | 25 | 65 | 1,055 | Sour | <u>5/</u> | 80 | 90 | 20 |
| Oklahoma | 85 | 25 | 60 | 933 | Sour | <u>5/</u> | 80 | 90 | 20 |
| Texas | 65 | 25 | 40 | 598 | Sour | <u>5/</u> | 80 | 90 | 20 |
| W.S. Central | 82 | 27 | 55 | 843 | Sour | — | 80 | 90 | 21 |
| Montana | 130 | 35 | 95 | <u>4/</u> 1,456 | Sour | 54 | 80 | 90 | 30 |
| Idaho | 370 | 70 | 300 | <u>4/</u> 3,925 | Sweet | <u>5/</u> | 80 | 90 | 30 |
| Colorado | 160 | 60 | 100 | <u>4/</u> 1,870 | Sour | (Most) | 80 | 90 | 30 |
| New Mexico | 155 | 30 | 125 | 2,226 | Sour | <u>5/</u> | 80 | 90 | 25 |
| Utah | 220 | 70 | 150 | <u>4/</u> 2,269 | Sweet ¹ / ₂ | 59 | 80 | 90 | 30 |
| Mountain | 200 | 62 | 138 | 2,218 | — | — | 80 | 90 | 29 |
| Washington | 390 | 90 | 300 | <u>4/</u> 4,574 | Sweet | 50 | 75 | 80 | 40 |
| Oregon | 250 | 80 | 170 | <u>4/</u> 3,052 | Sweet | 83 | 75 | 80 | 40 |
| California | 290 | 65 | 225 | <u>3/</u> 3,490 | Sweet | 50 | 80 | 90 | 30 |
| Pacific | 303 | 76 | 227 | 3,632 | Sweet | — | 77 | 83 | 37 |
| United States: | 174 | 41 | 133 | 2,386 | — | — | 80 | 89 | 23 |

1/ These State averages include sweet and sour cherries picked, packed, and sold as fresh fruit, and those delivered to processing plants. In those States where most of the cherries are sour it takes from 4.5 to 5 hours to pick, pack, and deliver 100 pounds of cherries when the yield is 1,800 to 3,000 pounds per acre; 5.5 to 6 hours per 100 pounds when yields are 900 to 1,800 pounds; and 6.5 to 7 hours per 100 pounds when yields are 500 to 900 pounds per acre. In the sweet cherry States, it takes about 5 to 5.5 hours per 100 pounds when yields are normal and most of the cherries are delivered to processing plants, and about 6 to 7 hours when most of the cherries are harvested for fresh consumption.

The estimated number of trees per acre is somewhat less than the number originally planted.

2/ Average for 1934 and 1939, except where noted.

3/ Four-year average, 1936-39.

4/ Four-year average, 1938-41.

5/ Not reported.

DATES: Labor requirements per acre 1/

| State | Bearing orchards | | | | Nonbearing orchards | | |
|---------------|--|--------------|--------------|---------------|---------------------|--------------|--------------|
| | : 1938-41: Number : | | | | Number : Total | | |
| | : Man hours per acre : average:of trees: | | | | of trees: man | | |
| | : : Pre- : : yield : per : | | | | per : hours | | |
| | Total: | harvest: | Harvest: | per acre: | acre : | acre : | per acre |
| | <u>Hours</u> | <u>Hours</u> | <u>Hours</u> | <u>Pounds</u> | <u>Trees</u> | <u>Trees</u> | <u>Hours</u> |
| Arizona | 180 | 140 | 40 | <u>2/</u> 725 | 50 | 60 | 60 |
| California | 275 | 150 | 125 | 2,660 | 50 | 60 | 70 |
| United States | 266 | 149 | 117 | 2,475 | 50 | 60 | 70 |

1/ The hours required to pick and haul 100 pounds of dates varies considerably, depending on the yield and variety. The packing is done in packing plants and requires additional labor. For converting number of trees to acres it is assumed that young orchards have a fuller stand of trees than have bearing orchards.

2/ Average of 1929 and 1939.

FIGS: Labor requirements per acre ^{1/}

| State | Bearing orchards | | | | Nonbearing orchards | | |
|----------------|--------------------|-----------------------------------|--------------------------|----------|---------------------------|---------------------------|---------------------------|
| | Man hours per acre | Average: Number of trees per acre | Pre-harvest: Harvest: 2/ | per acre | Number: of trees per acre | Number: of trees per acre | Total: man hours per acre |
| | Hours | Hours | Hours | Pounds | Trees | Trees | Hours |
| | | | | | | | |
| | | | | | | | |
| Virginia | : 98 | 30 | 68 | 2,065 | 120 | 140 | 20 |
| North Carolina | : 100 | 30 | 70 | 2,415 | 120 | 140 | 20 |
| South Carolina | : 118 | 30 | 88 | 2,838 | 120 | 140 | 20 |
| Georgia | : 105 | 30 | 75 | 2,293 | 120 | 140 | 20 |
| Florida | : 110 | 30 | 80 | 2,516 | 120 | 140 | 20 |
| So. Atlantic | : 106 | 30 | 76 | 2,424 | 120 | 140 | 20 |
| Tennessee | : 55 | 25 | 30 | 666 | 120 | 140 | 20 |
| Alabama | : 120 | 30 | 90 | 2,995 | 120 | 140 | 25 |
| Mississippi | : 120 | 30 | 90 | 3,022 | 120 | 140 | 25 |
| E. S. Central | : 111 | 29 | 82 | 2,701 | 120 | 140 | 24 |
| Arkansas | : 110 | 30 | 80 | 2,411 | 120 | 140 | 25 |
| Louisiana | : 150 | 40 | 110 | 3,922 | 120 | 140 | 30 |
| Oklahoma | : 60 | 30 | 30 | 688 | 120 | 140 | 20 |
| Texas | : 75 | 40 | 35 | 3/ 820 | 120 | 140 | 35 |
| W. S. Central | : 84 | 40 | 44 | 1,201 | 120 | 140 | 34 |
| Arizona | : 125 | 40 | 85 | 2,773 | 56 | 60 | 30 |
| Oregon | : 92 | 45 | 47 | 1,304 | 56 | 60 | 40 |
| California | : 155 | 55 | 100 | 3/ 5,860 | 50 | 55 | 45 |
| Pacific | : 155 | 55 | 100 | 5,854 | 50 | 55 | 45 |
| United States | : 147 | 53 | 94 | 5,336 | 59 | 66 | 43 |

^{1/} According to the census of 1940, figs are grown in a limited way in all Southern States, and in several of the Western States. Estimates are shown here for the most important States. The number of trees represents the number standing per acre, and not the number planted.

With the yields shown, it takes from 2 to 2.5 hours of labor to pick, pack, and haul 100 pounds of figs. In California, where 87 percent of the figs are dried, 6 percent canned, and 7 percent sold fresh, yields are exceptionally good, and it takes about 1.5 hours to pick and haul to the packing or processing plant 100 pounds of figs.

^{2/} Average for 1929 and 1939. Yields for a series of years are not available.

^{3/} Four-year average for 1938-41.

GRAPEFRUIT: Labor requirements per acre 1/

| State | : | Bearing orchards | | | | : | Nonbearing orchards | |
|---------------|---|--------------------|--------------|--------------|-------------------|--------------|---------------------|--------------|
| | : | | | | | : | | |
| | : | Man hours per acre | | : | 1933-41 : average | : | Number : of trees | : Total |
| | : | | | : | | : | of trees | : man |
| | : | : Pre- | : | : yield | : | per | per | : hours |
| | : | Total | :harvest: | Harvest: | per acre: | acre | acre | :per acre |
| | : | <u>Hours</u> | <u>Hours</u> | <u>Hours</u> | <u>Boxes</u> | <u>Trees</u> | <u>Trees</u> | <u>Hours</u> |
| Florida | : | 135 | 70 | 65 | <u>2/</u> 283 | 65 | 70 | 42 |
| Texas | : | 165 | 95 | 70 | <u>2/</u> 280 | 65 | 70 | 55 |
| Arizona | : | 145 | 85 | 60 | <u>3/</u> 309 | 85 | 90 | 50 |
| California | : | 115 | 90 | 25 | <u>3/</u> 120 | 80 | 85 | 54 |
| United States | : | 144 | 82 | 62 | — | 68 | 74 | 47 |

1/ It usually requires from 3.5 to 4.5 hours to pick one ton of grapefruit, and about 2.3 hours to load, haul, and unload a ton. These requirements do not include time for grading, packing, storing, and selling the fruit,

2/ Boxes of 80 pounds net.

3/ Boxes of 60 pounds net.

GRAPES: Labor requirements per acre 1/

| State | Bearing vineyards | | | | | | Nonbearing |
|----------------|--------------------|------------|------------|-------------|-------------|------------|------------|
| | | | | | | | vineyards |
| | Man hours per acre | | : Number: | | Percentage: | | |
| | : 1938-41 | | : of | | : of crop | | Total |
| | : Pre- | : average | : vines | : harvested | : per | : for pro- | hours |
| | Total harvest | Harvest | yield | per | for pro- | cessing 2/ | per |
| | : per acre | : per acre | : per acre | : per acre | : per acre | : per acre | per |
| | Hours | Hours | Hours | Pounds | Vines | Percent | Hours |
| Maine | 220 | 80 | 140 | 7,039 | 630 | | 100 |
| New Hampshire | 195 | 80 | 115 | 5,813 | 630 | | 100 |
| Vermont | 210 | 80 | 130 | 6,368 | 630 | | 100 |
| Massachusetts | 175 | 80 | 95 | 4,762 | 630 | | 100 |
| Rhode Island | 145 | 80 | 65 | 3,250 | 630 | | 100 |
| Connecticut | 140 | 80 | 60 | 3,100 | 630 | | 100 |
| New England | 150 | 80 | 70 | 3,533 | 630 | | 100 |
| New York | 130 | 80 | 50 | 3,400 | 630 | 47 | 100 |
| New Jersey | 135 | 70 | 65 | 3,235 | 630 | | 180 |
| Pennsylvania | 125 | 55 | 70 | 3,381 | 630 | 37 | 80 |
| Mid. Atlantic | 129 | 76 | 53 | 3,393 | 630 | | 95 |
| Ohio | 85 | 50 | 35 | 2,092 | 510 | 63 | 70 |
| Indiana | 115 | 50 | 65 | 3,285 | 510 | | 70 |
| Illinois | 130 | 50 | 80 | 3,874 | 510 | | 70 |
| Michigan | 90 | 50 | 40 | 2,443 | 510 | 25 | 80 |
| Wisconsin | 135 | 50 | 85 | 4,303 | 510 | | 80 |
| E. N. Central | 91 | 50 | 41 | 2,414 | 510 | | 74 |
| Minnesota | 135 | 55 | 80 | 4,014 | 570 | | 80 |
| Iowa | 155 | 55 | 100 | 4,027 | 570 | | 90 |
| Missouri | 155 | 80 | 75 | 2,950 | 570 | 5 | 120 |
| Nebraska | 120 | 50 | 70 | 3,485 | 570 | | 80 |
| Kansas | 115 | 50 | 65 | 3,144 | 570 | | 80 |
| W. N. Central | 144 | 67 | 77 | 3,232 | 570 | | 103 |
| Delaware | 150 | 75 | 75 | 3,979 | 600 | | 120 |
| Maryland | 160 | 75 | 85 | 4,698 | 600 | | 120 |
| Virginia | 215 | 85 | 130 | 7,696 | 600 | | 120 |
| West Virginia | 210 | 85 | 125 | 6,806 | 600 | | 120 |
| North Carolina | 330 | 100 | 230 | 9,922 | 350 | | 130 |
| South Carolina | 285 | 100 | 185 | 6,130 | 350 | | 130 |
| Georgia | 260 | 100 | 160 | 5,439 | 350 | | 130 |
| Florida | 130 | 90 | 40 | 1,182 | 465 | | 120 |
| So. Atlantic | 230 | 91 | 139 | 5,967 | 457 | | 126 |

- Continued -

GRAPES: Labor requirements per acre 1/ - Continued

| State | Bearing vineyards | | | | | | Nonbearing |
|---------------|--------------------|-----------|----------|----------|------------|---------|------------|
| | | | | | | | vineyards |
| | Man hours per acre | : 1938-41 | | Number | Percentage | | |
| | : Pre- | average | of vines | of crop | harvested | Total | hours |
| | Total harvest | Harvest | yield | per | for pro- | per | per |
| | : per acre | per acre | per acre | per acre | cessing 2/ | per | per |
| | Hours | Hours | Hours | Pounds | Vines | Percent | Hours |
| Kentucky | 180 | 90 | 90 | 4,172 | 500 | | 110 |
| Tennessee | 190 | 90 | 100 | 4,626 | 500 | | 110 |
| Alabama | 220 | 120 | 100 | 2,938 | 275 | | 150 |
| Mississippi | 190 | 120 | 70 | 1,824 | 200 | | 150 |
| E. S. Central | 195 | 100 | 95 | 3,786 | 413 | | 122 |
| Arkansas | 130 | 80 | 50 | 1,959 | 570 | 47 | 120 |
| Louisiana | 165 | 120 | 45 | 1,165 | 200 | | 150 |
| Oklahoma | 100 | 50 | 50 | 2,546 | 570 | | 80 |
| Texas | 110 | 50 | 60 | 2,952 | 570 | | 80 |
| W. S. Central | 123 | 72 | 51 | 2,172 | 568 | | 96 |
| Idaho | 180 | 60 | 120 | 6,073 | 500 | | 90 |
| Colorado | 140 | 60 | 80 | 3,856 | 490 | | 90 |
| New Mexico | 215 | 150 | 65 | 2,646 | 500 | | 150 |
| Arizona | 205 | 100 | 105 | 5,329 | 500 | | 120 |
| Utah | 130 | 70 | 60 | 3,105 | 500 | | 90 |
| Nevada | 170 | 70 | 100 | 5,100 | 500 | | 90 |
| Mountain | 177 | 102 | 75 | 3,596 | 499 | | 118 |
| Washington | 210 | 75 | 135 | 8,940 | 490 | Most | 100 |
| Oregon | 145 | 55 | 90 | 4,492 | 490 | 12 | 100 |
| California | 200 | 60 | 140 | 9,200 | 500 | 3/ | 100 |
| Pacific | 200 | 60 | 140 | 9,099 | 500 | | 100 |
| United States | 185 | 61 | 124 | 8,009 | 512 | | 99 |

1/ These estimates are State averages in which are included great variations in number of vines per acre, yields, varieties, marketing procedure, and care given the vineyard. In the Southern States 540 vines per acre for American bunch types of grapes, and 160 vines per acre for Muscadine types were used in calculating the average number of vines per acre.

On the average, American bunch grapes require from 1.5 to 2 man hours per 100 pounds to harvest and haul to market or processing. Muscadine varieties require around 4 man hours per 100 pounds.

2/ In several of the important grape producing States a considerable part of the crop is processed and the remainder is marketed as fresh grapes.

3/ Raisin varieties, 57 percent; table varieties, 17 percent; and wine varieties, 26 percent.

LEMONS: Labor requirements per acre 1/

| State | Bearing orchards | | | | Nonbearing orchards | | |
|---------------|---|-----------------------------------|----------|----------|---------------------|-------|-------|
| | Man hours:per acre | :1938-41 | Number | Number | Number | Total | |
| | | average | of trees | of trees | of trees | man | |
| | : Pre- : : Total :harvest;Harvest:per acre: acre : : per : per : hours | : yield : per : per : per : hours | | | | | |
| | : Hours | Hours | Hours | Boxes | Trees | Trees | Hours |
| Florida | : 115 | 80 | 35 | 2/ 48 | 70 | 75 | 40 |
| Texas | : 175 | 115 | 60 | 2/ 79 | 70 | 75 | 60 |
| Arizona | : 185 | 120 | 65 | 2/ 85 | 80 | 85 | 60 |
| California | : 290 | 120 | 170 | 3/240 | 85 | 90 | 60 |
| United States | : 286 | 119 | 167 | — | 85 | 90 | 60 |

1/ It normally takes from 15.5 to 16.5 man hours to pick one ton of lemons, and around 2.5 hours to load, haul, and unload a ton. This does not include grading, packing and storing, which generally is done by central packing plants.

2/ Average for 1929 and 1939. Boxes of 80 pounds net.

3/ 4-year average, 1938-41. Boxes of 76 pounds net.

LIMES: Labor requirements per acre 1/

| State | Bearing orchards | | | | Nonbearing orchards | | |
|---------------|--------------------|-----------|-----------|------------|---------------------|--------|------------|
| | Man hours per acre | | | | Number | | |
| | :1938-41 | | | | : Number | | |
| | : average | | | | : of trees | | |
| | : yield | | | | : per | | |
| | : Pre- | : | : harvest | : Harvest | : per | : per | : hours |
| | : Total | : harvest | : Harvest | : per acre | : acre | : acre | : per acre |
| | Hours | Hours | Hours | 2/ Boxes | Trees | Trees | Hours |
| Florida | 110 | 80 | 30 | 32 | 100 | 110 | 40 |
| California | 160 | 120 | 40 | 3/ 45 | 100 | 110 | 55 |
| United States | 115 | 84 | 31 | 33 | 100 | 110 | 41 |

1/ Florida produces 90 percent of the limes grown in the United States. It takes about 20 man hours to pick one ton of limes, and 2.5 hours to load, haul, and unload a ton. The above estimates do not include labor for grading, picking, storing, or selling limes.

2/ Boxes of approximately 80 pounds net.

3/ Average for 1929 and 1939.

ORANGES: Labor requirements per acre 1/

| State | Bearing orchards | | | | Nonbearing orchards | | |
|---------------|--------------------|-----------|-----------|------------|---------------------|--------|------------|
| | Man hours per acre | | | | Number | | |
| | :1938-41 | | | | : Number | | |
| | : average | | | | : of trees | | |
| | : yield | | | | : per | | |
| | : Pre- | : | : harvest | : Harvest | : per | : per | : hours |
| | : Total | : harvest | : Harvest | : per acre | : acre | : acre | : per acre |
| | Hours | Hours | Hours | Boxes | Trees | Trees | Hours |
| Florida | 140 | 80 | 60 | 2/ 150 | 65 | 70 | 40 |
| Texas | 170 | 105 | 65 | 2/ 131 | 65 | 70 | 55 |
| Arizona | 135 | 100 | 35 | 3/ 87 | 85 | 90 | 50 |
| California | 170 | 100 | 70 | 3/ 196 | 85 | 90 | 50 |
| United States | 156 | 91 | 65 | -- | 75 | 75 | 43 |

1/ Small acreages of oranges, largely Satsuma, are reported as grown in several other Southern States. From 6.5 to 8.0 hours are usually required to pick one ton of oranges, and about 2.5 hours are required to load, haul, and unload a ton. In the commercial districts grading and packing are done in central packing plants. These labor requirements do not include this labor.

2/ 90 pounds net.

3/ 70 pounds net.

PEACHES: Labor requirements per acre 1/

| State | Bearing orchards | | | | | Nonbearing orchards |
|----------------|---|-------|-------|---------|----------|---------------------|
| | Man hours per acre : 1938-41 : average : | | | | | Total |
| | : Pre- : : yield : : trees : | | | | | hours |
| | : Total harvest : Harvest : per acre : per acre : | | | | | per |
| | : Hours : Hours : Hours : Bushels : Trees 2/ : | | | | | acre |
| | Hours | Hours | Hours | Bushels | Trees 2/ | Hours |
| Maine | 85 | 55 | 30 | 47 | 110 | 30 |
| New Hampshire | 95 | 55 | 40 | 66 | 110 | 30 |
| Vermont | 105 | 55 | 50 | 83 | 110 | 30 |
| Massachusetts | 85 | 50 | 35 | 66 | 110 | 30 |
| Rhode Island | 100 | 55 | 45 | 88 | 110 | 30 |
| Connecticut | 110 | 50 | 60 | 120 | 110 | 30 |
| New England | 99 | 51 | 48 | 93 | 110 | 30 |
| New York | 105 | 50 | 55 | 106 | 100 | 25 |
| New Jersey | 125 | 55 | 70 | 160 | 110 | 25 |
| Pennsylvania | 110 | 55 | 55 | 123 | 120 | 20 |
| Mid. Atlantic | 111 | 53 | 58 | 123 | 110 | 23 |
| Ohio | 80 | 40 | 40 | 73 | 100 | 20 |
| Indiana | 80 | 40 | 40 | 75 | 90 | 20 |
| Illinois | 85 | 40 | 45 | 89 | 90 | 20 |
| Michigan | 100 | 45 | 55 | 113 | 120 | 20 |
| Wisconsin | 70 | 40 | 30 | 40 | 100 | 20 |
| E. N. Central | 89 | 42 | 47 | 93 | 104 | 20 |
| Iowa | 65 | 35 | 30 | 40 | 90 | 20 |
| Missouri | 75 | 40 | 55 | 57 | 100 | 25 |
| Nebraska | 90 | 40 | 50 | 85 | 100 | 20 |
| Kansas | 70 | 40 | 30 | 43 | 90 | 20 |
| W. N. Central | 73 | 39 | 34 | 54 | 97 | 23 |
| Delaware | 135 | 55 | 80 | 157 | 120 | 22 |
| Maryland | 125 | 55 | 70 | 144 | 120 | 22 |
| Virginia | 115 | 55 | 60 | 104 | 100 | 25 |
| West Virginia | 95 | 50 | 45 | 75 | 100 | 20 |
| North Carolina | 130 | 70 | 60 | 113 | 130 | 30 |
| South Carolina | 125 | 65 | 60 | 110 | 110 | 30 |
| Georgia | 105 | 50 | 55 | 103 | 125 | 30 |
| Florida | 90 | 55 | 35 | 47 | 75 | 30 |
| South Atlantic | 114 | 56 | 58 | 106 | 118 | 28 |

- Continued -

PEACHES: Labor requirements per acre 1/ - Continued

| State | Bearing orchards | | | | | Nonbearing orchards |
|---------------|--------------------|----------|-----------|-----------|----------|---------------------|
| | Man hours per acre | | 1938-41 | Number | | Total |
| | | | average | of | | hours |
| | Pre- | yield | trees | per | | acre |
| | Total:harvest: | Harvest: | per acre: | per acre: | | |
| | Hours | Hours | Hours | Bushels | Trees 2/ | Hours |
| Kentucky | 100 | 50 | 50 | 68 | 110 | 22 |
| Tennessee | 110 | 55 | 55 | 85 | 130 | 30 |
| Alabama | 125 | 65 | 60 | 110 | 125 | 30 |
| Mississippi | 130 | 65 | 65 | 119 | 120 | 30 |
| E. S. Central | 116 | 59 | 57 | 94 | 122 | 28 |
| Arkansas | 90 | 40 | 50 | 83 | 100 | 25 |
| Louisiana | 120 | 65 | 55 | 95 | 120 | 30 |
| Oklahoma | 80 | 30 | 50 | 81 | 100 | 25 |
| Texas | 60 | 30 | 30 | 44 | 80 | 20 |
| W. S. Central | 75 | 35 | 40 | 64 | 91 | 23 |
| Idaho | 200 | 100 | 100 | 233 | 114 | 50 |
| Colorado | 215 | 110 | 105 | 260 | 135 | 60 |
| New Mexico | 140 | 80 | 60 | 130 | 110 | 50 |
| Arizona | 140 | 80 | 60 | 115 | 90 | 50 |
| Utah | 170 | 80 | 90 | 209 | 140 | 45 |
| Nevada | 140 | 90 | 50 | 88 | 90 | 45 |
| Mountain | 194 | 99 | 95 | 229 | 132 | 56 |
| Washington | 260 | 130 | 130 | 300 | 114 | 45 |
| Oregon | 200 | 130 | 70 | 145 | 114 | 45 |
| California | 295 | 140 | 155 | 290 | 100 | 45 |
| Pacific | 286 | 133 | 143 | 283 | 102 | 45 |
| United States | 125 | 61 | 64 | 120 | 108 | 27 |

1/ Labor requirements for harvest include labor for picking, packing, and hauling to market or to processing plant. About 65 percent of the Washington crop is sold as fresh peaches, and 56 percent of the California crop is canned, 20 percent is dried, 8 percent is dehydrated, and 16 percent is sold as fresh fruit.

In most States it takes from 0.5 to 0.6 hour to pick, pack, and market a bushel of peaches. In some of the less important States the time requirement is about 0.7 hour per bushel, and in a few of the heavy producing States like Idaho, Utah, Colorado, and Washington, the labor requirement for harvesting is around 0.4 to 0.5 hour per bushel.

2/ The number of trees per acre was considered to be the same for bearing and nonbearing orchards. The number shown for each State is somewhat less than the number originally planted.

PEARS: Labor requirements per acre 1/

| State | Bearing orchards | | | | Nonbearing orchards | | |
|----------------|--------------------|----------------------|-----------------|-----------------|---------------------|-----------------|-------|
| | Man hours per acre | 1938-41 : average : | Number of trees | Number of trees | Number of trees | Total man hours | |
| | : Pre- : | : yield : | : trees : | : trees : | : trees : | : hours : | |
| | Total : harvest : | Harvest : per acre : | per acre : | per acre : | per acre : | per acre : | |
| | Hours | Hours | Hours | Bushels | Trees | Trees | Hours |
| Maine | : 50 | 20 | 39 | 66 | 70 | 75 | 20 |
| New Hampshire | : 50 | 20 | 30 | 72 | 70 | 75 | 20 |
| Vermont | : 45 | 20 | 25 | 52 | 70 | 75 | 20 |
| Massachusetts | : 60 | 20 | 40 | 77 | 70 | 75 | 20 |
| Rhode Island | : 50 | 20 | 30 | 60 | 70 | 75 | 20 |
| Connecticut | : 75 | 20 | 55 | 103 | 70 | 75 | 20 |
| New England | : 63 | 20 | 43 | 84 | 70 | 75 | 20 |
| New York | : 75 | 20 | 55 | 104 | 70 | 75 | 20 |
| New Jersey | : 70 | 20 | 50 | 96 | 70 | 75 | 20 |
| Pennsylvania | : 70 | 20 | 50 | 95 | 70 | 75 | 20 |
| Mid. Atlantic | : 74 | 20 | 54 | 102 | 70 | 75 | 20 |
| Ohio | : 70 | 20 | 50 | 96 | 70 | 75 | 20 |
| Indiana | : 85 | 20 | 65 | 138 | 70 | 75 | 20 |
| Illinois | : 60 | 20 | 40 | 75 | 70 | 75 | 15 |
| Michigan | : 70 | 20 | 50 | 99 | 70 | 75 | 20 |
| Wisconsin | : 70 | 20 | 50 | 2/100 | 70 | 75 | 20 |
| E. N. Central | : 68 | 20 | 48 | 95 | 70 | 75 | 19 |
| Minnesota | : 70 | 20 | 50 | 2/100 | 70 | 75 | 20 |
| Iowa | : 80 | 20 | 60 | 130 | 70 | 75 | 15 |
| Missouri | : 75 | 20 | 55 | 121 | 70 | 75 | 20 |
| Nebraska | : 60 | 20 | 40 | 75 | 70 | 75 | 15 |
| Kansas | : 60 | 20 | 40 | 2/75 | 70 | 75 | 15 |
| W. N. Central | : 71 | 20 | 51 | 108 | 70 | 75 | 18 |
| Delaware | : 70 | 20 | 50 | 100 | 70 | 75 | 20 |
| Maryland | : 60 | 20 | 40 | 84 | 70 | 75 | 20 |
| Virginia | : 85 | 20 | 65 | 150 | 70 | 75 | 20 |
| West Virginia | : 65 | 25 | 40 | 75 | 70 | 75 | 20 |
| North Carolina | : 80 | 25 | 55 | 118 | 70 | 75 | 25 |
| South Carolina | : 90 | 25 | 65 | 152 | 70 | 75 | 25 |
| Georgia | : 90 | 25 | 65 | 149 | 70 | 75 | 25 |
| Florida | : 80 | 25 | 55 | 116 | 70 | 75 | 20 |
| So. Atlantic | : 81 | 23 | 58 | 128 | 70 | 75 | 23 |

- Continued -

PEARS: Labor requirements per acre ^{1/} - Continued

| State | Bearing orchards | | | | | Nonbearing orchards | |
|---------------|--------------------|---------|---------|----------|----------|---------------------|----------|
| | 1935-41 | | | | Number | Number | Total |
| | Man hours per acre | | | | average | of | men |
| | Pre- | | | | yield | trees | hours |
| | Total | harvest | Harvest | per acre | per acre | per acre | per acre |
| | Hours | Hours | Hours | Bushels | Trees | Trees | Hours |
| Kentucky | 90 | 25 | 65 | 156 | 70 | 75 | 20 |
| Tennessee | 75 | 25 | 50 | 106 | 70 | 75 | 20 |
| Alabama | 90 | 25 | 65 | 147 | 70 | 75 | 25 |
| Mississippi | 95 | 25 | 70 | 170 | 70 | 75 | 25 |
| E. S. Central | 87 | 25 | 62 | 143 | 70 | 75 | 23 |
| Arkansas | 80 | 25 | 55 | 113 | 70 | 75 | 25 |
| Louisiana | 90 | 25 | 65 | 153 | 70 | 75 | 25 |
| Oklahoma | 60 | 20 | 40 | 76 | 70 | 75 | 20 |
| Texas | 75 | 20 | 55 | 123 | 90 | 95 | 20 |
| W. S. Central | 75 | 22 | 53 | 115 | 78 | 84 | 22 |
| Montana | 100 | 50 | 50 | 100 | 90 | 100 | 40 |
| Idaho | 140 | 50 | 90 | 228 | 100 | 105 | 50 |
| Wyoming | 100 | 50 | 50 | 100 | 70 | 75 | 40 |
| Colorado | 120 | 60 | 60 | 136 | 90 | 100 | 40 |
| New Mexico | 125 | 50 | 75 | 185 | 90 | 100 | 40 |
| Arizona | 105 | 50 | 55 | 113 | 90 | 100 | 40 |
| Utah | 135 | 60 | 75 | 186 | 90 | 100 | 50 |
| Nevada | 115 | 50 | 65 | 159 | 90 | 100 | 40 |
| Mountain | 128 | 58 | 70 | 169 | 91 | 101 | 46 |
| Washington | 325 | 150 | 175 | 414 | 100 | 105 | 80 |
| Oregon | 225 | 125 | 100 | 228 | 70 | 75 | 80 |
| California | 225 | 135 | 90 | 3/ 190 | 90 | 100 | 65 |
| Pacific | 244 | 136 | 108 | 240 | 88 | 87 | 75 |
| United States | 158 | 78 | 80 | 174 | 80 | 81 | 37 |

^{1/} Labor requirements for harvest include labor for picking, packing, and hauling to market or to processing plant. About 20 percent of the California crop is dried, 40 percent canned, and 40 percent sold for fresh consumption.

Little information is available on the number of pear trees per acre, and the data shown here are only rough approximations for most States. The number shown is less than the number originally planted.

It usually takes about 0.4 to 0.5 of an hour to harvest, pack, and haul a bushel of pears.

^{2/} Short-time average.

^{3/} 4-year average as reported by the California Reporting Service.

PLUMS AND PRUNES: Labor requirements per acre $\frac{1}{2}$

| State | Bearing orchards | | | | Nonbearing orchards | | |
|----------------|--------------------|----------|----------|------------------|---------------------|-------------|------------|
| | Man hours per acre | | Yield | Number | Number | Number | Total |
| | : Pre- : | | : per : | : of : | : of : | : of : | : hours |
| | Total: | harvest: | Harvest: | 2/ | : per acre: | : per acre: | : per acre |
| | Hours | Hours | Hours | Bushels | Trees | Trees | Hours |
| New York | : 60 | 30 | 30 | 47 | 90 | 100 | 20 |
| New Jersey | : 65 | 30 | 35 | 54 | 90 | 100 | 20 |
| Pennsylvania | : 65 | 30 | 35 | 54 | 90 | 100 | 20 |
| Mid. Atlantic | : 62 | 30 | 32 | 50 | 90 | 100 | 20 |
| Ohio | : 60 | 30 | 30 | 47 | 90 | 100 | 20 |
| Indiana | : 60 | 30 | 30 | 50 | 90 | 100 | 20 |
| Illinois | : 60 | 30 | 30 | 43 | 90 | 100 | 15 |
| Michigan | : 70 | 30 | 40 | $\frac{3}{2}$ 65 | 90 | 100 | 20 |
| Wisconsin | : 55 | 30 | 25 | 36 | 90 | 100 | 20 |
| E. N. Central | : 62 | 30 | 32 | 51 | 90 | 100 | 19 |
| Minnesota | : 55 | 25 | 30 | 44 | 90 | 100 | 20 |
| Iowa | : 50 | 25 | 25 | 37 | 90 | 100 | 15 |
| Missouri | : 50 | 30 | 20 | 27 | 90 | 100 | 20 |
| North Dakota | : 45 | 25 | 20 | 27 | 90 | 100 | 20 |
| South Dakota | : 50 | 25 | 25 | 32 | 90 | 100 | 20 |
| Nebraska | : 40 | 25 | 15 | 21 | 90 | 100 | 15 |
| Kansas | : 45 | 30 | 15 | 21 | 90 | 100 | 15 |
| W. N. Central | : 50 | 27 | 23 | 33 | 90 | 100 | 18 |
| Delaware | : 60 | 30 | 30 | 45 | 90 | 100 | 20 |
| Maryland | : 60 | 30 | 30 | 50 | 90 | 100 | 20 |
| Virginia | : 60 | 30 | 30 | 47 | 90 | 100 | 20 |
| West Virginia | : 60 | 35 | 25 | 33 | 90 | 100 | 20 |
| North Carolina | : 70 | 35 | 35 | 61 | 90 | 100 | 25 |
| South Carolina | : 80 | 35 | 45 | 74 | 90 | 100 | 25 |
| Georgia | : 70 | 35 | 35 | 60 | 90 | 100 | 25 |
| Florida | : 65 | 35 | 30 | 40 | 90 | 100 | 25 |
| So. Atlantic | : 66 | 34 | 32 | 51 | 90 | 100 | 23 |
| Kentucky | : 50 | 30 | 20 | 27 | 90 | 100 | 20 |
| Tennessee | : 60 | 30 | 30 | 50 | 90 | 100 | 20 |
| Alabama | : 75 | 35 | 40 | 64 | 90 | 100 | 25 |
| Mississippi | : 70 | 35 | 35 | 60 | 90 | 100 | 25 |
| E. S. Central | : 62 | 32 | 30 | 46 | 90 | 100 | 23 |
| Arkansas | : 65 | 35 | 30 | 40 | 90 | 100 | 25 |
| Louisiana | : 65 | 35 | 30 | 39 | 90 | 100 | 25 |
| Oklahoma | : 50 | 25 | 25 | 36 | 90 | 100 | 20 |
| Texas | : 45 | 25 | 20 | 30 | 90 | 100 | 20 |
| W. S. Central | : 52 | 28 | 24 | 34 | 90 | 100 | 21 |

PLUMS AND PRUNES: Labor requirements per acre 1/ - Continued

| State | Bearing orchards | | | | Nonbearing orchards | | |
|---------------|--------------------|----------------|-----------------|-----------------|---------------------|-------------|---------|
| | Man hours per acre | Yield per acre | Number of trees | Number of trees | Number of trees | Total hours | |
| | : Pre-harvest | : Harvest | : 2/ | : per acre | : per acre | : per acre | |
| | : Hours | : Hours | : Hours | : Bushels | : Trees | : Trees | : Hours |
| Montana | : 80 | 50 | 30 | 48 | 90 | 100 | 35 |
| Idaho | : 120 | 60 | 60 | <u>3/</u> 154 | 90 | 100 | 40 |
| Wyoming | : 70 | 50 | 20 | 30 | 90 | 100 | 40 |
| Colorado | : 90 | 55 | 35 | 61 | 90 | 100 | 40 |
| New Mexico | : 90 | 55 | 35 | 63 | 90 | 100 | 40 |
| Arizona | : 95 | 50 | 45 | 83 | 90 | 100 | 40 |
| Utah | : 90 | 55 | 35 | 62 | 90 | 100 | 40 |
| Nevada | : 80 | 50 | 30 | 49 | 90 | 100 | 40 |
| Mountain | : 111 | 58 | 53 | 127 | 90 | 100 | 40 |
| Washington | : 125 | 70 | 55 | <u>3/</u> 94 | 80 | 90 | 55 |
| Oregon | : 110 | 55 | 55 | <u>3/</u> 85 | 80 | 90 | 40 |
| California | : 130 | 65 | 65 | <u>3/</u> 117 | 80 | 90 | 45 |
| Pacific | : 126 | 63 | 63 | 110 | 80 | 90 | 45 |
| United States | : 115 | 58 | 57 | 100 | 82 | 91 | 33 |

1/ In converting tree numbers to acreages 90 bearing and 100 nonbearing trees per acre were used in all States. These are somewhat less than the number originally planted. It usually requires 0.6 to 0.7 of an hour to pick, pack, and haul a bushel of prunes. In the Northwest it takes about 0.5 hour per bushel for plums sold fresh and 0.75 hour per bushel for those dried or dehydrated.

In Washington, 70 percent of the 4-year production were canned or sold fresh and 30 percent were dehydrated; in Oregon, 40 percent were canned or sold fresh, and 60 percent were dehydrated; in California, about 60 percent of the prunes were dehydrated and 40 percent were sun dried. Nearly 50 percent of the dehydrating in California is done by farm labor. One hundred and seventeen bushels of fresh prunes make 1.3 tons of dried prunes. One bushel of fresh prunes weighs 56 pounds.

2/ Average for 1934 and 1939, except as indicated.

3/ Four-year average, 1938-41.

QUINCES: Labor requirements per acre 1/

| State | Bearing orchards | | | | Nonbearing orchards |
|---------------|--------------------|---------|----------|----------|---------------------|
| | Man hours per acre | | Average | Total | |
| | | | yield | | |
| | | | per acre | | |
| | Pre-harvest | | for 1929 | per acre | |
| Total | harvest | Harvest | and 1939 | | |
| | Hours | Hours | Hours | Bushels | Hours |
| Massachusetts | 100 | 50 | 50 | 130 | 30 |
| Connecticut | 95 | 50 | 45 | 113 | 30 |
| New England | 100 | 50 | 50 | 124 | 30 |
| New York | 110 | 50 | 60 | 197 | 30 |
| Pennsylvania | 85 | 50 | 35 | 74 | 30 |
| Mid. Atlantic | 105 | 50 | 55 | 179 | 30 |
| Ohio | 85 | 50 | 35 | 72 | 30 |
| Michigan | 100 | 50 | 50 | 123 | 30 |
| E. N. Central | 95 | 50 | 45 | 104 | 30 |
| Virginia | 85 | 50 | 35 | 78 | 30 |
| Tennessee | 90 | 50 | 40 | 92 | 30 |
| Texas | 85 | 40 | 45 | 143 | 30 |
| Arizona | 90 | 50 | 40 | 104 | 40 |
| Washington | 105 | 50 | 55 | 182 | 40 |
| Oregon | 100 | 50 | 50 | 174 | 40 |
| California | 85 | 50 | 35 | 94 | 40 |
| Pacific | 87 | 50 | 37 | 105 | 40 |
| United States | 100 | 50 | 50 | 149 | 34 |

1/ The census of agriculture reports a few quince trees of bearing and nonbearing age in nearly all States. Data are shown here for several selected quince producing States. Computations were based on 250 trees per acre throughout. Man labor for picking, and preparing and delivering the fruit to market, average about 0.5 hour per bushel with yields of 50 to 80 bushels per acre; 0.4 hour per bushel with yields of about 100 bushels; and 0.2 to 0.3 of an hour per bushel with yields of 150 to 400 bushels per acre.

ALMONDS: Labor requirements per acre 1/

| State | Man hours per acre | | | | Average |
|------------|--------------------|---------|------------|-------|--------------|
| | Bearing | | Nonbearing | | yield per |
| | Pre- | | | | bearing acre |
| | Total | harvest | Harvest | Total | 1937-40 |
| | Hours | Hours | Hours | Hours | Pounds |
| California | 96 | 62 | 34 | 35 | 516 |

1/ Although the census of agriculture reports a few almond trees in each of several States, California produces practically all of the commercial crop. Labor estimates are based on 70 trees per acre and one hour of man labor to harvest and market 15 pounds of nuts, with average yields of about 500 to 600 pounds per acre.

FILBERTS (HAZELNUTS): Labor requirements per acre 1/

| State | Man hours per acre | | | | Average |
|------------|--------------------|---------|------------|-------|--------------|
| | Bearing | | Nonbearing | | yield per |
| | Pre- | | | | bearing acre |
| | Total | harvest | Harvest | Total | 1937-40 |
| | Hours | Hours | Hours | Hours | Pounds |
| Washington | 63 | 20 | 43 | 25 | 608 |
| Oregon | 69 | 20 | 49 | 30 | 690 |
| Pacific | 68 | 20 | 48 | 29 | 674 |

1/ Although the census of agriculture reports filberts and hazelnuts in several States, they are of almost no commercial importance except in Washington and Oregon. In general, there are about 110 trees per acre and it takes one hour of man labor to harvest and market 14 pounds of nuts, with average yields from 600 to 700 pounds per acre.

WALNUTS, PERSIAN (ENGLISH): Labor requirements per acre 1/

| State | Man hours per acre | | | | Average |
|------------|--------------------|---------|------------|-------|--------------|
| | Bearing | | Nonbearing | | yield per |
| | Pre- | | | | bearing acre |
| | Total | harvest | Harvest | Total | 1937-41 |
| | Hours | Hours | Hours | Hours | Pounds |
| Washington | 49 | 25 | 24 | 10 | 350 |
| Oregon | 52 | 25 | 27 | 10 | 405 |
| California | 81 | 30 | 51 | 15 | 1,022 |
| Pacific | 76 | 29 | 47 | 14 | 912 |

1/ Persian walnuts are grown in a very limited way in several States, but the 3 Pacific Coast States produce the commercial crop. Labor estimates are based on 24 bearing trees, or 30 nonbearing trees per acre, and one hour of labor to harvest and market 15 pounds of nuts in Washington and Oregon, and 20 pounds in California, with average yields.

PECANS (IMPROVED): Labor requirements per acre 1/

| State | Man hours per acre | | | | : 1938-41 : | |
|----------------|---------------------|---------|---------|-------|----------------------|--------|
| | | | | | : average : | |
| | Bearing | | | | : Non- : yield per: | |
| | | | | | : bearing: bearing : | |
| | : Pre- : : : acre : | | | | : trees | |
| | Total | harvest | Harvest | Total | : per | |
| | Hours | Hours | Hours | Hours | Pounds | Number |
| North Carolina | : 35.0 | 12.0 | 23.0 | 7 | 185 | 13 |
| South Carolina | : 35.5 | 12.0 | 23.5 | 7 | 180 | 14 |
| Georgia | : 33.5 | 10.5 | 23.0 | 9 | 135 | 14 |
| Florida | : 27.0 | 6.0 | 21.0 | 10 | 115 | 15 |
| So. Atlantic | : 33.0 | 10.0 | 23.0 | 9 | 138 | 14 |
| Alabama | : 34.5 | 13.0 | 21.5 | 8 | 125 | 13 |
| Mississippi | : 33.0 | 14.0 | 19.0 | 8 | 100 | 13 |
| E. S. Central | : 34.0 | 13.0 | 21.0 | 8 | 116 | 13 |
| Arkansas | : 30.5 | 12.0 | 18.5 | 8 | 140 | 12 |
| Louisiana | : 31.5 | 8.0 | 23.5 | 6 | 190 | 11 |
| Oklahoma | : 35.0 | 11.0 | 24.0 | 9 | 140 | 15 |
| Texas | : 27.0 | 10.0 | 17.0 | 8 | 70 | 13 |
| W. S. Central | : 29.0 | 10.0 | 19.0 | 7 | 117 | 13 |
| United States | : 32.0 | 11.0 | 21.0 | 8 | 128 | 13 |

1/ These estimates are for orchards in the commercial pecan areas. The nonbearing orchards are frequently interplanted with crops, and the hours of labor were prorated to pecans and other crops on the basis of land area occupied by each. The hours for nonbearing orchards are averages per year for developing orchards to 10 years of age by present approved methods.

Improved pecan trees are reported by the agricultural census in very limited numbers in several States not shown here. Production per tree and per acre varies tremendously. The yields shown are estimates of average production per bearing acre, as cared for during the last several years. It is estimated that a man working 10 hours will, on the average, club and pick from 100 to 140 pounds of pecans, depending on the yield. It usually takes an additional 2 hours per 100 pounds to haul, dry, store, and market the nuts. Most pecans of small producers are sold at the farm.

BLACKBERRIES AND DEWBERRIES: Labor requirements per acre 1/

| State | Man hours per acre | | | Average yield per acre 2/ Quarts |
|----------------|--------------------|------------|---------|--|
| | Total | Preharvest | Harvest | |
| | Hours | Hours | Hours | |
| Maine | 195 | 100 | 95 | 615 |
| New Hampshire | 195 | 100 | 95 | 622 |
| Vermont | 195 | 100 | 95 | 606 |
| Massachusetts | 180 | 100 | 80 | 462 |
| Rhode Island | 155 | 100 | 55 | 272 |
| Connecticut | 190 | 100 | 90 | 575 |
| New England | 191 | 100 | 91 | 572 |
| New York | 220 | 120 | 100 | 702 |
| New Jersey | 260 | 100 | 160 | 1,211 |
| Pennsylvania | 210 | 120 | 90 | 527 |
| Mid. Atlantic | 240 | 110 | 130 | 942 |
| Ohio | 210 | 110 | 100 | 703 |
| Indiana | 185 | 90 | 95 | 655 |
| Illinois | 180 | 90 | 90 | 537 |
| Michigan | 245 | 120 | 125 | 1,015 |
| Wisconsin | 175 | 90 | 85 | 487 |
| E. N. Central | 221 | 110 | 111 | 834 |
| Minnesota | 190 | 100 | 90 | 529 |
| Iowa | 185 | 90 | 95 | 608 |
| Missouri | 210 | 120 | 90 | 580 |
| Nebraska | 205 | 90 | 115 | 798 |
| Kansas | 190 | 90 | 100 | 684 |
| W. N. Central | 204 | 112 | 92 | 600 |
| Delaware | 185 | 90 | 95 | 670 |
| Maryland | 250 | 130 | 120 | 968 |
| Virginia | 200 | 110 | 90 | 529 |
| West Virginia | 175 | 100 | 75 | 371 |
| North Carolina | 300 | 120 | 180 | 1,359 |
| South Carolina | 210 | 110 | 100 | 686 |
| Georgia | 180 | 100 | 80 | 423 |
| Florida | 185 | 100 | 85 | 481 |
| So. Atlantic | 247 | 112 | 135 | 957 |
| Kentucky | 170 | 100 | 70 | 360 |
| Tennessee | 195 | 110 | 85 | 456 |
| Alabama | 200 | 110 | 90 | 539 |
| Mississippi | 185 | 100 | 85 | 441 |

BLACKBERRIES AND DEWBERRIES: Labor requirements per acre 1/ - Continued

| State | Man hours per acre | | | Average yield per acre 2/ |
|---------------|--------------------|------------|---------|------------------------------------|
| | Total | Preharvest | Harvest | |
| | Hours | Hours | Hours | |
| Arkansas | 185 | 100 | 85 | 486 |
| Louisiana | 175 | 110 | 65 | 325 |
| Oklahoma | 200 | 110 | 90 | 529 |
| Texas | 210 | 110 | 100 | 688 |
| W. S. Central | 202 | 108 | 94 | 601 |
| Montana | 240 | 130 | 110 | 808 |
| Idaho | 260 | 140 | 120 | 964 |
| Colorado | 230 | 130 | 100 | 667 |
| New Mexico | 205 | 125 | 80 | 410 |
| Arizona | 235 | 125 | 110 | 830 |
| Utah | 255 | 140 | 115 | 873 |
| Mountain | 250 | 137 | 113 | 848 |
| Washington | 585 | 185 | 400 | 4,242 |
| Oregon | 405 | 170 | 235 | 2,340 |
| California | 309 | 120 | 180 | 1,633 |
| Pacific | 472 | 166 | 306 | 3,140 |
| United States | 243 | 116 | 127 | 980 |

1/ Commercial areas. Low yields require relatively more time to harvest a quart of berries than do high yields. The number of quarts of berries picked, packed, and marketed with one hour of labor was estimated to be about as follows: Yields of less than 500 quarts per acre, $4\frac{1}{2}$ to 5 quarts per hour; yields of 500 to 700 quarts, 6 to 7 quarts per hour; yields of 700 to 1,000 quarts, 7 to 8 quarts per hour; yields of 1,000 to 1,500 quarts, 8 to 9 quarts per hour; yields of 1,500 to 2,000 quarts, 9 to 10 quarts per hour; yields of 2,000 and more quarts, 10 to 12 quarts per hour. One quart of berries weighs about $1\frac{1}{2}$ pounds net.

2/ Averages for 1929 and 1939, as reported by the Bureau of the Census. Yields are not available for a series of years.

BLUEBERRIES: Labor requirements per acre 1/

| State | Tame | | | | Wild | |
|----------------|---------------------|-------|-------------------------|--------|--------------------|--------|
| | Man hours per acre | | Average yield | | Man hours per acre | |
| | Pre-harvest | | Harvest | | Average yield | |
| | : Total : harvest : | | : per acre : for har- : | | : per acre : | |
| | : 2/ : | | : vesting : | | : 2/ : | |
| | Hours | Hours | Hours | Quarts | Hours | Quarts |
| Maine | 90 | 50 | 40 | 423 | 90 | 276 |
| New Hampshire | 95 | 50 | 45 | 438 | 50 | 148 |
| Vermont | 65 | 50 | 15 | 123 | 35 | 107 |
| Massachusetts | 125 | 50 | 75 | 752 | 50 | 150 |
| Rhode Island | 65 | 50 | 15 | 88 | 70 | 205 |
| Connecticut | 105 | 50 | 55 | 531 | 95 | 281 |
| New England | 91 | 50 | 41 | 429 | 83 | 254 |
| New York | 160 | 75 | 85 | 1,044 | 60 | 170 |
| New Jersey | 190 | 100 | 90 | 1,111 | 100 | 298 |
| Pennsylvania | 150 | 75 | 75 | 750 | 30 | 96 |
| Mid. Atlantic | 186 | 97 | 89 | 1,098 | 51 | 147 |
| Ohio | 165 | 75 | 90 | 1,087 | 100 | 292 |
| Indiana | 155 | 75 | 80 | 933 | 50 | 144 |
| Michigan | 165 | 75 | 90 | 880 | 80 | 243 |
| Wisconsin | 160 | 50 | 110 | 1,281 | 75 | 230 |
| E. N. Central | 165 | 75 | 90 | 890 | 75 | 227 |
| Minnesota | 110 | 50 | 60 | 545 | 30 | 92 |
| Iowa | 105 | 50 | 55 | 515 | 180 | 716 |
| Missouri | 140 | 50 | 90 | 877 | — | — |
| W. N. Central | 118 | 50 | 68 | 646 | 31 | 94 |
| Maryland | — | — | — | — | 200 | 3/773 |
| West Virginia | 115 | 50 | 65 | 661 | 55 | 159 |
| North Carolina | 160 | 80 | 80 | 3/ 986 | — | — |
| South Carolina | 90 | 70 | 20 | 3/ 136 | — | — |
| Georgia | 120 | 70 | 50 | 465 | — | — |
| Florida | 110 | 70 | 40 | 293 | — | — |
| So. Atlantic | 113 | 71 | 40 | 394 | 63 | 191 |
| Tennessee | 80 | 60 | 20 | 3/ 120 | — | — |
| Alabama | 125 | 60 | 65 | 670 | — | — |
| Mississippi | 90 | 60 | 30 | 212 | — | — |
| E. S. Central | 116 | 60 | 56 | 557 | — | — |

- Continued -

BLUEBERRIES: Labor requirements per acre 1/ - Continued

| State | Tame | | | | Wild | |
|---------------|--------------------------------------|---------|---------|----------|--------------------------|--------------------|
| | Man hours per acre | | | | Average | Man hours: Average |
| | : Pre- : Harvest : 2/ : vesting : 2/ | | | | yield : per acre : yield | per acre : yield |
| | Total | harvest | Harvest | Quarts | Hours | Quarts |
| Arkansas | 130 | 60 | 70 | 725 | -- | -- |
| Louisiana | 90 | 60 | 30 | 3/ 210 | -- | -- |
| Texas | 100 | 60 | 40 | 3/ 335 | -- | -- |
| W. S. Central | 96 | 60 | 36 | 290 | -- | -- |
| Washington | 250 | 90 | 160 | 3/ 1,830 | -- | -- |
| California | 120 | 90 | 30 | 3/ 164 | -- | -- |
| Pacific | 199 | 90 | 109 | 1,172 | -- | -- |
| United States | 126 | 68 | 58 | 611 | 80 | 243 |

1/ Estimates are for tame blueberries, and for wild blueberries, as reported by the Bureau of the Census. It generally requires 1 hour of labor to pick, machine clean, and haul to market from 10 to 15 quarts of tame blueberries. Wild blueberries are usually harvested and marketed at the rate of 3 or 4 quarts per hour of labor.

2/ Averages for 1929 and 1939, as reported by the Bureau of the Census. Yields for a series of years are not available.

3/ For 1929 only.

BOYSENBERRIES: Labor requirements per acre 1/

| State | Men hours per acre | | | 1939 |
|----------------|--------------------|------------|---------|----------------------|
| | Total | Preharvest | Harvest | yield per acre 2/ |
| | Hours | Hours | Hours | Quarts |
| Connecticut | 175 | 109 | 75 | 407 |
| New Jersey | 195 | 100 | 95 | 650 |
| Pennsylvania | 220 | 120 | 100 | 681 |
| Mid-Atlantic | 206 | 109 | 97 | 664 |
| Ohio | 200 | 110 | 90 | 637 |
| Indiana | 220 | 90 | 130 | 1,111 |
| Illinois | 175 | 90 | 85 | 540 |
| Michigan | 205 | 120 | 85 | 569 |
| E. N. Central | 196 | 105 | 91 | 641 |
| Missouri | 230 | 120 | 110 | 775 |
| Maryland | 310 | 130 | 180 | 1,602 |
| Virginia | 200 | 110 | 90 | 605 |
| North Carolina | 225 | 120 | 105 | 738 |
| South Carolina | 270 | 110 | 160 | 1,608 |
| Georgia | 195 | 100 | 95 | 661 |
| So. Atlantic | 208 | 108 | 100 | 713 |
| Kentucky | 145 | 100 | 45 | 266 |
| Tennessee | 160 | 110 | 50 | 299 |
| Mississippi | 235 | 100 | 135 | 1,227 |
| E. S. Central | 171 | 107 | 64 | 451 |
| Arkansas | 200 | 100 | 100 | 719 |
| Oklahoma | 205 | 110 | 95 | 658 |
| W. S. Central | 202 | 105 | 97 | 689 |
| Montana | 210 | 130 | 80 | 506 |
| Idaho | 310 | 140 | 170 | 1,572 |
| Colorado | 230 | 130 | 100 | 703 |
| Arizona | 240 | 125 | 115 | 799 |
| Utah | 235 | 140 | 95 | 670 |
| Mountain | 275 | 157 | 136 | 1,148 |

- Continued -

BOYSENBERRIES: Labor requirements per acre 1/ - Continued

| State | : | Man hours per acre | | | : | 1939 yield per acre 2/ |
|---------------|---|--------------------|------------|---------|---|---------------------------------|
| | : | | | | : | |
| | : | Total | Preharvest | Harvest | : | |
| | : | : | : | : | : | |
| | : | Hours | Hours | Hours | : | Quarts |
| Washington | : | 295 | 175 | 120 | : | 938 |
| Oregon | : | 370 | 170 | 200 | : | 1,902 |
| California | : | 335 | 125 | 260 | : | 2,782 |
| Pacific | : | 366 | 154 | 212 | : | 2,100 |
| United States | : | 340 | 147 | 193 | : | 1,867 |

1/ Commercial areas. Labor requirements for picking, packing, and hauling Boysenberries are about the same as for blackberries of the same yield. One quart of berries weighs about $1\frac{1}{2}$ pounds net.

2/ Yields shown for 1939 only, and in some instances may be considerably out of line with average yields.

CRANBERRIES: Labor requirements per acre ^{1/}

| State | Man hours per acre | | | | | | 1930-39 average yield- per acre |
|---------------|--------------------|-----------------|---------|----------|-----------------|---------|--|
| | Hand picking | | | Scooping | | | |
| | Total | Pre- harvest | Harvest | Total | Pre- harvest | Harvest | |
| | Hours | Hours | Hours | Hours | Hours | Hours | |
| | | | | | | | Barrels |
| Maine | 236 | 200 | 36 | 203 | 200 | 8 | <u>2/</u> 6.8 |
| New Hampshire | 197 | 180 | 17 | 185 | 180 | 5 | <u>2/</u> 2.6 |
| Massachusetts | 300 | 220 | 80 | 235 | 220 | 15 | 30.0 |
| Rhode Island | 250 | 200 | 50 | 207 | 200 | 7 | <u>2/</u> 5.2 |
| Connecticut | 290 | 210 | 80 | 225 | 210 | 15 | <u>2/</u> 19.8 |
| New England | 299 | 220 | 79 | 235 | 220 | 15 | 29.8 |
| New York | 285 | 210 | 75 | 224 | 210 | 14 | <u>2/</u> 13.3 |
| New Jersey | 246 | 200 | 46 | 210 | 200 | 10 | 9.6 |
| Mid. Atlantic | 247 | 200 | 47 | 210 | 200 | 10 | 9.8 |
| Michigan | 224 | 200 | 24 | 206 | 200 | 6 | <u>2/</u> 4.2 |
| Wisconsin | 301 | 220 | 81 | 237 | 220 | 17 | 29.9 |
| W. N. Central | 293 | 213 | 75 | 234 | 213 | 16 | 27.3 |
| Minnesota | 302 | 220 | 82 | 230 | 220 | 10 | <u>2/</u> 30.7 |
| Washington | 300 | 215 | 85 | 230 | 215 | 15 | 21.6 |
| Oregon | 303 | 220 | 83 | 233 | 220 | 13 | 30.9 |
| Pacific | 301 | 217 | 84 | 232 | 216 | 16 | 24.4 |
| United States | 284 | 214 | 70 | 228 | 214 | 14 | 23.9 |

^{1/} Commercial cranberry bogs are pruned, sanded, weeded, irrigated, fertilized, and limed. Ditches are cleaned and treatment is provided for pest and insect control. All of this normally takes around 200 hours per acre. Although harvesting cranberries by the scoop method results in a loss of from 10 to 20 percent of the yield, the saving in labor more than makes up the loss. Scooping requires usually .5 to 1 hour of labor per barrel, while hand picking requires from 2.5 to 5.0 hours of labor per barrel. One barrel contains about 85 quarts of cranberries and weighs from 90 to 105 pounds.

^{2/} Averages for 1929 and 1939, as shown by the Bureau of the Census. A series of yields are not available for these States.

CURRENTS: Labor requirements per acre 1/

| State | Man. hours per acre | | | Average yield per acre 2/ |
|----------------|---------------------|--------------------------|------------------|---------------------------------|
| | Total Hours | Pre- harvest Hours | Harvest Hours | |
| *Maine | 185 | 90 | 95 | 834 |
| *New Hampshire | 175 | 90 | 85 | 677 |
| *Vermont | 185 | 90 | 95 | 873 |
| *Massachusetts | 185 | 90 | 95 | 762 |
| *Rhode Island | 190 | 90 | 100 | 893 |
| *Connecticut | 200 | 90 | 110 | 1,093 |
| New England | 192 | 90 | 102 | 942 |
| New York | 250 | 100 | 150 | 1,666 |
| *New Jersey | 230 | 90 | 140 | 1,412 |
| *Pennsylvania | 215 | 100 | 115 | 1,144 |
| Mid. Atlantic | 248 | 100 | 148 | 1,635 |
| Ohio | 205 | 90 | 115 | 1,132 |
| *Indiana | 160 | 80 | 80 | 630 |
| *Illinois | 160 | 80 | 80 | 637 |
| Michigan | 210 | 90 | 120 | 1,170 |
| *Wisconsin | 175 | 90 | 85 | 682 |
| E. N. Central | 205 | 90 | 115 | 1,107 |
| *Minnesota | 175 | 90 | 85 | 684 |
| *Iowa | 170 | 80 | 90 | 729 |
| *North Dakota | 150 | 90 | 60 | 407 |
| *Nebraska | 160 | 80 | 80 | 665 |
| *Kansas | 130 | 80 | 50 | 328 |
| W. N. Central | 171 | 89 | 82 | 653 |
| *Maryland | 200 | 100 | 100 | 890 |
| *Virginia | 175 | 100 | 75 | 512 |
| *Georgia | 175 | 90 | 85 | 653 |
| So. Atlantic | 190 | 98 | 92 | 767 |
| *Oklahoma | 160 | 100 | 60 | 389 |
| *Texas | 160 | 90 | 70 | 470 |
| W. S. Central | 160 | 98 | 62 | 402 |

- Continued -

CURRENTS: Labor requirements per acre 1/ - Continued

| | Man hours per acre | | | Average |
|---------------|--------------------|--------------|--------------|-------------------|
| State | Total | Pre-harvest | Harvest | yield per acre 2/ |
| | <u>Hours</u> | <u>Hours</u> | <u>Hours</u> | <u>Quarts</u> |
| *Montana | 195 | 100 | 95 | 761 |
| *Idaho | 220 | 120 | 100 | 918 |
| *Wyoming | 150 | 100 | 50 | 320 |
| *Colorado | 180 | 100 | 80 | 661 |
| *New Mexico | 150 | 100 | 50 | 322 |
| *Arizona | 155 | 100 | 55 | 383 |
| *Utah | 225 | 110 | 115 | 1,148 |
| *Nevada | 185 | 120 | 65 | 486 |
| Mountain | 199 | 107 | 92 | 818 |
| Washington | 345 | 145 | 200 | 2,205 |
| *Oregon | 235 | 130 | 105 | 971 |
| California | 245 | 100 | 145 | 1,431 |
| Pacific | 300 | 127 | 173 | 1,826 |
| United States | 241 | 101 | 140 | 1,482 |

1/ Currants were reported by the 1930 and 1940 census of agriculture for the States shown. In most States the acreage was very small. In those States marked with an asterisk (*) the acreage reported for 1939 was less than 100. The requirements shown are for units of 1 acre or more in size. The number of quarts that is normally picked, packed, and hauled to market with 1 hour of labor varies from about 7 to 10, depending largely on the yield per acre.

2/ Averages for 1929 and 1939, as reported by the Bureau of the Census. Yields for a series of years are not available.

GOOSEBERRIES: Labor requirements per acre 1/

| State | Man hours per acre | | | Average yield per acre 2/ Quarts |
|---------------|--------------------|-----------------|---------|---|
| | Total | Pre- harvest | Harvest | |
| | Hours | Hours | Hours | |
| Connecticut | 190 | 90 | 100 | 990 |
| New York | 220 | 100 | 120 | 1,356 |
| New Jersey | 170 | 90 | 80 | 712 |
| Pennsylvania | 185 | 100 | 85 | 760 |
| Mid. Atlantic | 217 | 100 | 117 | 1,301 |
| Ohio | 185 | 90 | 95 | 858 |
| Indiana | 150 | 80 | 70 | 616 |
| Illinois | 150 | 80 | 70 | 590 |
| Michigan | 190 | 90 | 100 | 1,065 |
| Wisconsin | 220 | 90 | 130 | 1,545 |
| E. N. Central | 184 | 89 | 95 | 982 |
| Minnesota | 170 | 90 | 80 | 707 |
| Iowa | 150 | 80 | 70 | 590 |
| Missouri | 175 | 110 | 65 | 539 |
| North Dakota | 150 | 90 | 60 | 475 |
| South Dakota | 170 | 100 | 70 | 629 |
| Nebraska | 130 | 80 | 50 | 383 |
| Kansas | 145 | 80 | 65 | 549 |
| W. N. Central | 169 | 102 | 67 | 559 |
| West Virginia | 150 | 100 | 50 | 394 |
| Kentucky | 155 | 100 | 55 | 428 |
| Tennessee | 190 | 100 | 90 | 842 |
| E. S. Central | 162 | 100 | 62 | 511 |
| Arkansas | 165 | 100 | 65 | 554 |

- Continued -

GOOSEBERRIES: Labor requirements per acre 1/ - Continued

| State | Man hours per acre | | | Average yield per acre 2/ Quarts |
|---------------|--------------------|-------------|---------|---|
| | Total | Pre-harvest | Harvest | |
| | Hours | Hours | Hours | |
| Montana | 160 | 100 | 60 | 499 |
| Idaho | 215 | 120 | 95 | 905 |
| Wyoming | 185 | 100 | 85 | 769 |
| Colorado | 235 | 100 | 135 | 1,621 |
| New Mexico | 155 | 100 | 55 | 442 |
| Utah | 265 | 110 | 155 | 1,882 |
| Mountain | 229 | 110 | 119 | 1,325 |
| Washington | 320 | 145 | 175 | 2,384 |
| Oregon | 250 | 130 | 120 | 1,256 |
| California | 230 | 100 | 130 | 1,445 |
| Pacific | 268 | 133 | 135 | 1,558 |
| United States | 234 | 118 | 116 | 1,288 |

1/ Gooseberries are grown in a very limited way in most States, according to the 1930 and 1940 census reports. A few gooseberry bushes are reported in several of the States not listed here. The labor requirements shown are estimates for units of one acre or more in size. The number of quarts that is picked, packed, and hauled to market with one hour of labor varies from about 8 to 15, depending largely on the yield per acre.

2/ Averages for 1929 and 1939, as reported by the Bureau of the Census. Yields for a series of years are not available.

LOGANBERRIES: Labor requirements per acre 1/

| State | Man hours per acre | | | Average yield per acre <u>2/</u> |
|---------------|--------------------|-------------|---------|--|
| | Total | Pre-harvest | Harvest | |
| | Hours | Hours | Hours | Quarts |
| Oklahoma | 225 | 110 | 115 | 951 |
| Idaho | 265 | 140 | 125 | 1,037 |
| Washington | 390 | 175 | 215 | 2,135 |
| Oregon | 370 | 170 | 200 | 1,967 |
| California | 325 | 125 | 200 | 1,940 |
| Pacific | 372 | 168 | 204 | 2,006 |
| United States | 370 | 168 | 202 | 1,994 |

1/ Commercial areas. Labor requirements for picking, packing, and hauling loganberries are about the same as for blackberries of the same yield. One quart of berries weighs about $1\frac{1}{2}$ pounds net.

2/ Averages for 1929 and 1939, as reported by the Bureau of the Census. Yields are not available for a series of years.

RASPBERRIES: Labor requirements per acre 1/

| State | Man hours per acre | | | Average yield per acre 2/ Quarts |
|----------------|--------------------|-----------------|---------|---|
| | Total | Pre- harvest | Harvest | |
| | Hours | Hours | Hours | |
| Maine | 305 | 130 | 175 | 779 |
| New Hampshire | 285 | 120 | 165 | 656 |
| Vermont | 305 | 120 | 185 | 842 |
| Massachusetts | 280 | 120 | 160 | 644 |
| Rhode Island | 225 | 100 | 125 | 492 |
| Connecticut | 290 | 120 | 170 | 772 |
| New England | 294 | 123 | 171 | 744 |
| New York | 340 | 140 | 200 | 994 |
| New Jersey | 255 | 100 | 155 | 707 |
| Pennsylvania | 305 | 120 | 185 | 832 |
| Mid. Atlantic | 321 | 130 | 191 | 920 |
| Ohio | 300 | 120 | 180 | 817 |
| Indiana | 270 | 100 | 170 | 683 |
| Illinois | 265 | 100 | 165 | 652 |
| Michigan | 270 | 100 | 170 | 705 |
| Wisconsin | 255 | 100 | 155 | 699 |
| E. N. Central | 273 | 103 | 170 | 717 |
| Minnesota | 295 | 100 | 195 | 966 |
| Iowa | 260 | 90 | 170 | 676 |
| Missouri | 300 | 120 | 180 | 820 |
| North Dakota | 190 | 90 | 100 | 399 |
| South Dakota | 245 | 120 | 125 | 498 |
| Nebraska | 240 | 90 | 150 | 599 |
| Kansas | 260 | 100 | 160 | 649 |
| W. H. Central | 234 | 100 | 134 | 847 |
| Delaware | 225 | 90 | 135 | 539 |
| Maryland | 375 | 160 | 215 | 1,075 |
| Virginia | 280 | 120 | 160 | 732 |
| West Virginia | 265 | 120 | 145 | 575 |
| North Carolina | 275 | 120 | 155 | 700 |
| South Carolina | 215 | 120 | 95 | 378 |
| Georgia | 275 | 120 | 155 | 614 |
| So. Atlantic | 307 | 134 | 173 | 783 |

RASPBERRIES: Labor requirements per acre 1/ - Continued

| State | Man hours per acre | | | Average yield per acre <u>2/</u> |
|---------------|--------------------|-----------------|---------|--|
| | Total | Pre- harvest | Harvest | |
| | Hours | Hours | Hours | Quarts |
| Kentucky | 280 | 120 | 160 | 645 |
| Tennessee | 295 | 120 | 175 | 696 |
| Alabama | 365 | 120 | 245 | 1,213 |
| E. S. Central | 291 | 120 | 171 | 697 |
| Arkansas | 260 | 120 | 140 | 570 |
| Oklahoma | 230 | 120 | 110 | 433 |
| W. S. Central | 258 | 120 | 138 | 562 |
| Montana | 405 | 160 | 245 | 1,221 |
| Idaho | 400 | 160 | 240 | 1,187 |
| Wyoming | 330 | 140 | 190 | 865 |
| Colorado | 335 | 140 | 195 | 936 |
| New Mexico | 280 | 135 | 145 | 578 |
| Arizona | 315 | 140 | 175 | 786 |
| Utah | 435 | 160 | 275 | 1,364 |
| Nevada | 345 | 160 | 185 | 845 |
| Mountain | 389 | 154 | 235 | 1,156 |
| Washington | 500 | 175 | 325 | 1,965 |
| Oregon | 410 | 160 | 250 | 1,265 |
| California | 545 | 140 | 405 | 2,642 |
| Pacific | 457 | 164 | 293 | 1,663 |
| United States | 321 | 123 | 198 | 945 |

1/ Commercial areas. Yield has a direct bearing on the number of hours required to harvest an acre. Low yields require relatively more harvest time per quart than do large yields. The number of quarts of berries picked, packed, and marketed with one hour of labor were estimated to be as follows: Yields of less than 700 quarts per acre, 4 quarts per hour; yields of 700 to 1,000 quarts per acre, 4.5 quarts per hour; yields of 1,000 to 1,500 quarts per acre, 5 quarts per hour; yields of 1,500 to 2,000 quarts per acre, 6 quarts per hour; yields of over 2,000 quarts per acre, from 6 to 7 quarts per hour. One quart of berries weighs about $1\frac{1}{2}$ pounds net.

2/ Average for 1929 and 1939 as reported by the Bureau of the Census. Yields are not available for a series of years.

STRAWBERRIES: Labor requirements per acre 1/

| State | Man hours per acre | | | 1930-39 | Number |
|-----------------|--------------------|-------------|---------|----------------|------------------|
| | | | | average | of years |
| | Total | Pre-harvest | Harvest | yield per acre | beds are cropped |
| | Hours | Hours | Hours | Quarts | Years |
| Maine | 460 | 230 | 230 | 2/ 1,348 | 2 |
| New Hampshire | 485 | 230 | 255 | 2/ 1,497 | 2 |
| Vermont | 530 | 230 | 300 | 2/ 1,766 | 2 |
| Massachusetts | 650 | 230 | 420 | 2/ 2,520 | 2 |
| Rhode Island | 425 | 200 | 225 | 2/ 1,328 | 2 |
| Connecticut | 595 | 200 | 395 | 2/ 2,360 | 2 |
| New England | 574 | 222 | 352 | 2,094 | |
| *New York | 525 | 200 | 325 | 1,896 | 2 |
| *New Jersey | 475 | 130 | 345 | 2,016 | 2 |
| *Pennsylvania | 470 | 200 | 270 | 1,608 | 2 |
| Mid. Atlantic | 492 | 180 | 312 | 1,832 | |
| *Ohio | 410 | 150 | 260 | 1,536 | 2 |
| *Indiana | 435 | 150 | 285 | 1,656 | 2 |
| *Illinois | 365 | 150 | 215 | 1,248 | 2 |
| *Michigan | 490 | 220 | 270 | 1,584 | 2 |
| *Wisconsin | 445 | 220 | 225 | 1,320 | 2 |
| E. N. Central | 440 | 188 | 252 | 1,267 | |
| *Minnesota | 435 | 220 | 215 | 2/ 1,260 | 2 |
| Iowa | 380 | 150 | 230 | 1,344 | 2 |
| *Missouri | 265 | 95 | 170 | 936 | 2 |
| North Dakota | 245 | 100 | 145 | 2/ 790 | 2 |
| South Dakota | 235 | 100 | 135 | 2/ 730 | 2 |
| Nebraska | 265 | 140 | 125 | 2/ 680 | 2 |
| Kansas | 320 | 130 | 190 | 1,104 | 2 |
| W. N. Central | 312 | 127 | 185 | 1,046 | |
| *Delaware | 300 | 90 | 210 | 1,224 | 2 |
| *Maryland | 370 | 95 | 275 | 1,608 | 2 |
| *Virginia | 400 | 140 | 300 | 1,776 | 2 |
| West Virginia | 285 | 120 | 165 | 2/ 950 | 2 |
| *North Carolina | 585 | 275 | 310 | 1,752 | 3 |
| South Carolina | 490 | 200 | 290 | 1,632 | 3 |
| Georgia | 440 | 200 | 240 | 1,368 | 3 |
| *Florida | 970 | 550 | 420 | 1,680 | 1 |
| So. Atlantic | 544 | 237 | 307 | 1,612 | |

- Continued -

STRAWBERRIES: Labor requirements per acre 1/ - Continued

| State | Man hours per acre | | 1930-39 | Number | |
|---------------|--------------------|-------------|---------|------------------|---------|
| | | | average | of years | |
| | Total | Pre-harvest | Harvest | beds are cropped | |
| | Hours | Hours | Hours | Quarts | Years |
| **Kentucky | 315 | 100 | 215 | 1,296 | 3 |
| **Tennessee | 285 | 95 | 190 | 1,128 | 3 |
| Alabama | 700 | 400 | 300 | 1,776 | 1 and 3 |
| Mississippi | 575 | 350 | 225 | 1,296 | 1 and 3 |
| E. S. Central | 348 | 137 | 211 | 1,258 | |
| | | | | | |
| **Arkansas | 345 | 100 | 245 | 1,056 | 3 |
| **Louisiana | 940 | 480 | 460 | 1,584 | 1 |
| Oklahoma | 250 | 100 | 150 | 840 | 3 |
| Texas | 430 | 200 | 230 | 1,344 | 1 and 3 |
| W. S. Central | 647 | 296 | 351 | 1,330 | |
| | | | | | |
| Montana | 370 | 130 | 240 | 2/ 1,450 | 3 |
| Idaho | 375 | 130 | 245 | 2/ 1,400 | 3 |
| Wyoming | 300 | 150 | 150 | 2/ 890 | 3 |
| Colorado | 330 | 130 | 200 | 2/ 1,250 | 3 |
| New Mexico | 300 | 130 | 170 | 2/ 1,020 | 3 |
| Arizona | 445 | 130 | 315 | 2/ 1,890 | 3 |
| Utah | 370 | 130 | 240 | 1,440 | 3 |
| Nevada | 250 | 120 | 130 | 2/ 780 | 3 |
| Mountain | 366 | 130 | 236 | 1,410 | |
| | | | | | |
| **Washington | 470 | 170 | 300 | 1,704 | 3 |
| **Oregon | 395 | 110 | 285 | 1,632 | 3 |
| *California | 860 | 300 | 560 | 4,452 | 4 |
| Pacific | 518 | 169 | 349 | 2,262 | |
| | | | | | |
| United States | 487 | 201 | 286 | 1,494 | |

1/ Strawberries are grown commercially in areas of several States. In the North, commercial beds are usually picked two seasons before they are replaced. In most of the South and West the beds are left three seasons. In Florida, Louisiana and some sections of Alabama, Mississippi, and Texas, the beds are picked only one season before replacement. The labor requirements shown are yearly averages for the usual time the beds are left down. The first year, when the beds are being planted and tended, takes most of the preharvest labor. It usually takes from 4 to 4½ hours of labor to pick, pack and haul to market, a 24-quart crate of berries, depending on yield, and time spent in preparing the berries for market. In Florida and Louisiana, where the crop is early and packed mostly in pints, it takes 6 and 7 hours, respectively, per 24-quart crate.

2/ Averages for the two census years, 1934 and 1939.

** States having 4,000 to 7,500 acres in 1939.

** States having 7,500 or more acres in 1939.

YOUNGBERRIES: Labor requirements per acre 1/

| State | Man hours per acre | | | Yield per acre 2/ |
|----------------|--------------------|-----------------|---------|-------------------------|
| | Total | Pre- harvest | Harvest | |
| | | | | |
| | Hours | Hours | Hours | Quarts |
| Indiana | 205 | 90 | 115 | 880 |
| Illinois | 155 | 90 | 65 | 311 |
| E. N. Central | 165 | 90 | 75 | 425 |
| Missouri | 240 | 120 | 120 | 954 |
| Kansas | 180 | 90 | 90 | 530 |
| W. N. Central | 230 | 115 | 115 | 889 |
| Virginia | 275 | 110 | 165 | 1,265 |
| North Carolina | 200 | 120 | 80 | 427 |
| South Carolina | 200 | 110 | 90 | 584 |
| Georgia | 210 | 100 | 110 | 806 |
| Florida | 275 | 100 | 175 | 1,335 |
| So. Atlantic | 218 | 103 | 115 | 832 |
| Kentucky | 215 | 100 | 115 | 880 |
| Tennessee | 220 | 110 | 110 | 835 |
| Alabama | 270 | 110 | 160 | 1,239 |
| Mississippi | 275 | 100 | 175 | 1,343 |
| E. S. Central | 243 | 106 | 137 | 1,046 |
| Arkansas | 205 | 100 | 105 | 772 |
| Louisiana | 210 | 110 | 100 | 710 |
| Oklahoma | 200 | 110 | 90 | 642 |
| Texas | 215 | 110 | 105 | 769 |
| W. S. Central | 205 | 103 | 102 | 745 |
| Montana | 210 | 130 | 80 | 415 |
| Idaho | 305 | 140 | 165 | 1,280 |
| Arizona | 210 | 125 | 85 | 470 |
| Utah | 240 | 140 | 100 | 754 |
| Mountain | 284 | 139 | 145 | 1,107 |

- Continued -

YOUNGBERRIES: Labor requirements per acre 1/---Continued

| State | Man hours per acre | | | Yield per acre 2/ Quarts |
|---------------|--------------------|-----------------|---------|-----------------------------------|
| | Total | Pre- harvest | Harvest | |
| | Hours | Hours | Hours | |
| | | | | |
| Washington | 335 | 175 | 160 | 1,227 |
| Oregon | 370 | 170 | 200 | 1,870 |
| California | 350 | 125 | 225 | 2,127 |
| Pacific | 361 | 154 | 207 | 1,924 |
| United States | 324 | 142 | 182 | 1,648 |

1/ Commercial areas. Labor requirements for picking, packing, and hauling, youngberries are about the same as for blackberries for the same yield. One quart of berries weighs about $1\frac{1}{2}$ pounds net.

2/ Yields for 1939 as reported by the Bureau of the Census. Average yields for a series of years are not available, and some of those shown for 1939 may be considerably out of line with the average.

ARTICHOKES: (Globe) Labor requirements per acre

| State | Man hours per acre | | | 1930-39 average yield per acre |
|------------|--------------------|-----------------|---------|---|
| | Total | Pre- harvest | Harvest | |
| | Hours | Hours | Hours | |
| | | | | |
| California | 130 | 75 | 55 | 106 |

1/ Commercial crop. Boxes containing approximately 40 pounds.

BRUSSEL SPROUTS: Labor requirements per acre

| State | Man hours per acre | | | 1941 yield per acre |
|------------|--------------------|-----------------|---------|---------------------------|
| | Total | Pre- harvest | Harvest | |
| | Hours | Hours | Hours | |
| | | | | |
| California | 720 | 165 | 555 | 9,600 |

1/ Commercial crop. Adams 1941 crop manual - California.

ASPARAGUS: Labor requirements per acre 1/

| State | FOR FRESH MARKET <u>2/</u> | | | | |
|--------------------|----------------------------|-------------|---------|------------------|----------|
| | Man hours per acre | | 1930-39 | | |
| | | | average | | Seasonal |
| | Total | Pre-harvest | Harvest | yield | grouping |
| | Hours | Hours | Hours | Crates <u>3/</u> | per acre |
| Massachusetts | 190 | 30 | 160 | 92 | Late |
| New Jersey | 220 | 25 | 195 | 110 | Late |
| Pennsylvania | 195 | 25 | 170 | 98 | Late |
| Middle Atlantic | 216 | 25 | 191 | 108 | Late |
| Illinois | 175 | 20 | 155 | 62 | Late |
| Michigan | 200 | 25 | 175 | 87 | Late |
| East North Central | 184 | 22 | 162 | 69 | Late |
| Iowa | 150 | 20 | 130 | 51 | Late |
| Delaware | 220 | 25 | 195 | 97 | Late |
| Maryland | 250 | 25 | 225 | 112 | Late |
| South Carolina | 125 | 25 | 100 | 40 | Early |
| Georgia | 90 | 20 | 70 | 24 | Early |
| South Atlantic | 151 | 24 | 127 | 51 | All |
| Nevada | 175 | 50 | 125 | <u>4/</u> 55 | Late |
| Washington | 220 | 50 | 170 | 115 | Late |
| Oregon | 225 | 50 | 175 | 116 | Late |
| California | 190 | 50 | 140 | 94 | Early |
| Pacific | 196 | 50 | 146 | 97 | All |
| United States | 191 | 36 | 155 | 86 | All |
| FOR PROCESSING | | | | | |
| California | 125 | 50 | 75 | 1.2 Tons | |

1/ Commercial crop, from established beds.

2/ Includes undetermined quantities for processing in some States other than California.

3/ Crate of 24 pounds.

4/ Short-time average.

BEANS, LIMA: Labor requirements per acre

| State | For processing 1/ | | | | | For fresh consumption | | | | |
|-----------------|-------------------|--------|-----------|----------|------------------------|-----------------------|----------|-----------|---------|-----------|
| | Man hours | | :1930-39: | | Seasonal: | Man hours | | :1930-39 | | Seasonal: |
| | per acre | | :average: | | | per acre | | :average: | | |
| | : Pre- : | Har- : | yield : | group- : | : Pre- : | Har- : | yield : | group- : | | |
| | Total:harvest: | vest: | per : | ing : | Total:harvest: | vest: | per : | ing : | | |
| | : : | : : | : acre : | : : | : : | : : | : acre : | : : | | |
| | :Hours | Hours | Hours | Pounds | :Group | Hours | Hours | Hours | Bushels | |
| New Jersey | : 65 | 30 | 35 | 1,150 | : Inter- mediate | : 95 | 30 | 65 | 73 | |
| Michigan | : 60 | 25 | 35 | 1,090 | : : : : : | | | | | |
| Wisconsin | : 60 | 25 | 35 | 1,080 | : : | | | | | |
| E.N.Central | : 60 | 25 | 35 | 1,090 | : : | | | | | |
| Delaware | : 60 | 27 | 33 | 1,100 | : : | | | | | |
| Maryland | : 55 | 25 | 30 | 980 | : Inter- mediate | : 85 | 25 | 60 | 60 | |
| Virginia | : 70 | 30 | 40 | 1,300 | : Inter- mediate | : 88 | 30 | 58 | 58 | |
| | : : | | | | : : late | : 75 | 30 | 45 | 43 | |
| North Carolina | : : | | | | : Inter- mediate | : 90 | 30 | 60 | 55 | |
| South Carolina | : : | | | | : : Second early | : 100 | 27 | 73 | 66 | |
| Georgia | : : | | | | : : Second early | : 90 | 30 | 60 | 47 | |
| Florida | : : | | | | : : Early | : 110 | 30 | 80 | 82 | |
| So. Atlantic | : 63 | 28 | 35 | 1,145 | : All | : 99 | 29 | 70 | 62 | |
| Other States 1/ | : 65 | 30 | 35 | 1,080 | : : | | | | | |
| United States | : 64 | 29 | 35 | 1,120 | : All | : 98 | 29 | 69 | 64 | |

1/ Commercial areas. The States listed produced about 73 percent of the commercial lima bean acreage grown for processing. The other 27 percent is grown in Arkansas, California, Colorado, Georgia, Illinois, Indiana, Louisiana, Minnesota, New York, Ohio, North Carolina, Pennsylvania, Oregon, South Carolina, Tennessee, Utah, and Washington.

BEANS, SNAP: Labor requirements per acre 1/

| State | For processing <u>2/</u> | | | | For fresh consumption | | | |
|----------------|--------------------------|--------|-----------|----------|-----------------------|--------|----------|-------------------------|
| | Man hours | | :1930-39: | | Man hours | | :1930-39 | |
| | per acre | | :average: | | per acre | | :average | |
| | : Pre- : | Har- : | yield : | group- : | : Pre- : | Har- : | yield : | |
| | Total:harvest: | vest: | per | ing | Total:harvest: | vest: | per | |
| | : : : | : acre | : : | : : | : : : | : acre | : : | |
| | :Hours | Hours | Hours | Tons | : Group | Hours | Hours | Hours Bushels <u>3/</u> |
| Maine | : 155 | 35 | 120 | 2.7 | : : | | | |
| New York | : 110 | 30 | 80 | 1.6 | : Late | 125 | 30 | 95 <u>4/</u> 118 |
| New Jersey | : : | | | | : Inter. | 125 | 25 | 160 115 |
| | : : | | | | : Late | 115 | 25 | 90 92 |
| Pennsylvania | : 100 | 25 | 75 | 1.4 | : Late | 135 | 25 | 110 155 |
| Mid.Atlantic | : 107 | 29 | 73 | 1.6 | : All | 124 | 26 | 98 113 |
| Indiana | : 80 | 25 | 55 | 1.0 | : : | | | |
| Illinois | : : | | | | : Inter. | 75 | 20 | 55 43 |
| Michigan | : 95 | 25 | 70 | 1.4 | : Late | 105 | 25 | 80 80 |
| Wisconsin | : 95 | 25 | 70 | 1.4 | : : | | | |
| E.N.Central | : 94 | 25 | 69 | 1.3 | : All | 88 | 22 | 66 55 |
| Delaware | : 100 | 30 | 70 | 1.3 | : Inter. | 110 | 30 | 80 86 |
| Maryland | : 100 | 30 | 70 | 1.3 | : Inter. | 110 | 30 | 80 82 |
| | : : | | | | : Late | 105 | 30 | 75 74 |
| Virginia | : : | | | | : Inter. | 105 | 30 | 75 81 |
| | : : | | | | : S.W." | 100 | 30 | 70 78 |
| | : : | | | | : Late | 100 | 30 | 70 67 |
| North Carolina | : : | | | | : Inter. | 100 | 25 | 75 65 |
| | : : | | | | : W. " | 125 | 25 | 100 100 |
| | : : | | | | : Late | 100 | 25 | 75 65 |
| | : : | | | | : Second | | | |
| South Carolina | : 90 | 30 | 60 | .9 | : early | 100 | 30 | 70 56 |
| | : : | | | | : Late | 110 | 30 | 80 80 |
| | : : | | | | : Second | | | |
| Georgia | : : | | | | : early | 95 | 25 | 70 58 |
| | : : | | | | : N.Inter. | 125 | 25 | 100 108 |
| | : : | | | | : Early | | | |
| Florida | : : | | | | : (winter) | 115 | 25 | 90 89 |
| | : : | | | | : Spring | 110 | 25 | 85 85 |
| | : : | | | | : Fall | 125 | 25 | 100 106 |
| So. Atlantic | : 100 | 30 | 70 | 1.3 | : All | 111 | 26 | 85 84 |

- Continued -

BEANS, SNAP: Labor requirements per acre 1/ - Continued

| State | For processing 2/ | | | | | For fresh consumption | | | | |
|---------------|--------------------------|----------|--------------------------|-------------------------|--------------------------|-----------------------|--------------------------|----------|------------|--|
| | Man hours | | :1930-39: | | : | Man hours | | :1930-39 | | |
| | per acre | | :average: | | | per acre | | :average | | |
| | : Pre- : Har- : yield : | group- : | | : Pre- : Har- : yield : | group- : | | group- : | | | |
| | Total:harvest: vest: per | ing | Total:harvest: vest: per | ing | Total:harvest: vest: per | ing | Total:harvest: vest: per | ing | | |
| : | : | : | : acre : | : | : | : | : | : | : acre | |
| | :Hours | Hours | Hours | Tons | : Group | :Hours | Hours | Hours | Bushels 3/ | |
| Tennessee | : 90 | 30 | 60 | 1.1 | : Inter. | 100 | 30 | 70 | 70 | |
| | | | | | : Late | 130 | 30 | 100 | 105 | |
| Alabama | | | | | : Second | | | | | |
| | | | | | : early | 100 | 30 | 70 | 62 | |
| Mississippi | | | | | : Second | | | | | |
| | | | | | : early | 110 | 30 | 80 | 67 | |
| | : 80 | 30 | 50 | .8 | : Late | 90 | 30 | 60 | 42 | |
| E.S.Central | : 86 | 30 | 56 | .95 | : All | 107 | 30 | 77 | 67 | |
| Arkansas | : 90 | 30 | 60 | 1.0 | : Inter. | 90 | 20 | 70 | 50 | |
| | | | | | : Second | | | | | |
| Louisiana | : 90 | 30 | 60 | 1.0 | : early | 105 | 30 | 75 | 64 | |
| | | | | | : Late | 100 | 30 | 70 | 55 | |
| Texas | | | | | : Early | 110 | 30 | 80 | 67 | |
| | | | | | : Fall | 105 | 30 | 75 | 50 | |
| W.S.Central | : 90 | 30 | 60 | 1.0 | : All | 103 | 29 | 74 | 61 | |
| Colorado | : 325 | 90 | 235 | 2.7 | : Late | 280 | 90 | 190 | 141 | |
| Utah | : 360 | 90 | 270 | 3.1 | : | | | | | |
| Mountain | : 340 | 90 | 250 | 2.8 | : Late | 280 | 90 | 190 | 141 | |
| Washington | : 435 | 95 | 340 | 4.0 | : | | | | | |
| Oregon | : 510 | 110 | 400 | 5.0 | : | | | | | |
| California | : 430 | 90 | 340 | 4.0 | : Early | 270 | 90 | 180 | 126 | |
| | | | | | : Late | 310 | 90 | 220 | 168 | |
| Pacific | : 477 | 103 | 374 | 4.5 | : All | 286 | 90 | 196 | 140 | |
| All other 2/ | : 105 | 30 | 75 | 1.2 | : | | | | | |
| United States | : 131 | 35 | 96 | 1.5 | : All | 124 | 31 | 93 | 85 | |

1/ Commercial areas. Pole beans for the most part in Colorado, Utah, Washington, Oregon and California.

2/ The States listed produce about 88 percent of the commercial snap bean acreage grown for processing. The other 12 percent is grown in Alabama, Florida, Georgia, Idaho, Illinois, Iowa, Kansas, Kentucky, Massachusetts, Minnesota, Missouri, Montana, Nebraska, New Hampshire, New Jersey, North Carolina, Ohio, Oklahoma, Texas, Vermont, Virginia, West Virginia, and Wyoming.

3/ Bushels of 30 pounds.

4/ Short-time average.

BEETS, (TABLE): Labor requirements per acre 1/

| State | For processing | | | | For fresh consumption | | | |
|----------------|-----------------|--------------|--------------|--------------|-----------------------|--------------|--------------|-------------------------|
| | Man hours | | :1930-39: | | Man hours | | :1930-39 | |
| | per acre | | :average: | | per acre | | :average | |
| | : Pre- | : Har- | : yield | : group- | : Pre- | : Har- | : yield | |
| | :Total:harvest: | vest: | per | ing | :Total:harvest: | vest: | per | |
| | : : : : acre | : : : : acre | : : : : acre | : : : : acre | : : : : acre | : : : : acre | : : : : acre | |
| | :Hours | Hours | Hours | Tons | :Group | Hours | Hours | Hours Bushels <u>2/</u> |
| New York | : 145 | 70 | 75 | 5.9 | : | | | |
| New Jersey | : 155 | 70 | 85 | 6.9 | : Inter- | 265 | 100 | 165 280 |
| Pennsylvania | : | | | | : Late | 285 | 70 | 215 359 |
| Mid. Atlantic | : 145 | 70 | 75 | 6.1 | : All | 269 | 94 | 175 294 |
| Indiana | : 110 | 70 | 40 | 3.5 | : | | | |
| Michigan | : 130 | 70 | 60 | 5.7 | : | | | |
| Wisconsin | : 140 | 70 | 70 | 6.8 | : | | | |
| E. N. Central | : 135 | 70 | 65 | 6.2 | : All | | | |
| Virginia | : | | | | : Inter- | | | |
| | : | | | | : mediate | 285 | 85 | 200 234 |
| North Carolina | : | | | | : Inter- | | | |
| | : | | | | : mediate | 250 | 105 | 145 207 |
| South Carolina | : | | | | : Second | | | |
| So. Atlantic | : 300 | | | | : early | 300 | 100 | 200 260 |
| | : | | | | : All | 281 | 91 | 190 254 |
| Louisiana | : | | | | : Second | | | |
| Texas | : 180 | | | | : early | 180 | 80 | 100 129 |
| W. S. Central | : 170 | | | | : Early | 170 | 70 | 100 140 |
| | : | | | | : All | 172 | 72 | 100 137 |
| Oregon | : 150 | 100 | 50 | 5.0 | : | | | |
| Other States | : 130 | 75 | 55 | 5.3 | : | | | |
| United States | : 139 | 73 | 66 | 5.9 | : All | 202 | 78 | 124 176 |

1/ Commercial areas. The States shown produce about 80 percent of the commercial beet acreage used for growing beets for processing. The regional averages are for the States shown. The following other States collectively produce the remaining 20 percent of the total acreage for processing: California, Colorado, Delaware, Georgia, Illinois, Iowa, Kansas, Kentucky, Louisiana, Maine, Maryland, Minnesota, Mississippi, Missouri, Nebraska, North Carolina, Ohio, Oklahoma, Pennsylvania, South Carolina, Tennessee, Texas, Utah, Virginia, and Washington.

2/ Bushels of approximately 52 pounds.

CABBAGE: Labor requirements per acre 1/

| State | For processing 2/ | | | | | For fresh consumption | | | | |
|---------------|-------------------|--------|-----------|----------|-----------------------------|-----------------------|------------|------------|--------------|-----------|
| | Man hours | | :1930-39: | | Seasonal: | Man hours | | :1930-39 | | Seasonal: |
| | per acre | | :average: | | | per acre | | :average | | |
| | : Pre- | : Har- | : yield | : group- | : Pre- | : Har- | : yield | : group- | | |
| | Total:harvest: | vest: | per | ing | Total:harvest: | vest: | per | ing | | |
| : | : | : | : acre | : | : | : | : | : acre | : | |
| | Hours | Hours | Hours | Tons | Group | Hours | Hours | Hours | Tons | |
| New York | : 95 | : 45 | : 50 | : 9.4 | : Inter- mediate Late | : 110 110 | : 45 45 | : 65 55 | : 9.2 8.7 | |
| New Jersey | : | : | : | : | : Inter- mediate | : 90 | : 50 | : 40 | : 5.9 | |
| Pennsylvania | : | : | : | : | : Late | : 100 | : 50 | : 50 | : 7.7 | |
| Mid. Atlantic | : 95 | : 45 | : 50 | : 9.4 | : All | : 99 | : 47 | : 52 | : 8.2 | |
| Ohio | : 100 | : 55 | : 45 | : 7.6 | : Inter- mediate Late | : 100 105 | : 60 55 | : 40 50 | : 6.0 7.1 | |
| Indiana | : 90 | : 55 | : 35 | : 6.1 | : Late | : 100 | : 55 | : 45 | : 6.5 | |
| Illinois | : 90 | : 55 | : 35 | : 6.1 | : Inter- mediate | : 105 | : 60 | : 45 | : 6.3 | |
| Michigan | : 95 | : 50 | : 45 | : 7.6 | : Late | : 100 | : 50 | : 50 | : 7.0 | |
| Wisconsin | : 90 | : 50 | : 40 | : 6.7 | : Late | : 100 | : 50 | : 50 | : 7.1 | |
| E.N. Central | : 92 | : 52 | : 40 | : 6.8 | : All | : 101 | : 52 | : 49 | : 6.9 | |
| Minnesota | : 90 | : 50 | : 40 | : 6.6 | : Late | : 95 | : 50 | : 45 | : 6.1 | |
| Iowa | : | : | : | : | : Inter- mediate | : 100 | : 55 | : 45 | : 5.9 | |
| Missouri | : | : | : | : | : Inter- mediate | : 95 | : 55 | : 40 | : 5.1 | |
| W.N. Central | : 90 | : 50 | : 40 | : 6.6 | : All | : 96 | : 52 | : 44 | : 5.8 | |

- Continued -

CABBAGE: Labor requirements per acre 1/ - Continued

| State | For processing 2/ | | | | For fresh consumption | | | | |
|----------------|-------------------|---------------------|-------------------|----------------------------|-----------------------|---------------------|-------------------|----------------------------|-------|
| | Man hours | | :1930-39: | | Man hours | | :1930-39 | | |
| | per acre | | :average: | | per acre | | :average | | |
| | : Pre- :Total: | : Har- :harvest: | : yield :vest: | : group : per : acre | : Pre- :Total: | : Har- :harvest: | : yield :vest: | : group : per : acre | |
| | Hours | Hours | Hours | Tons | Group | Hours | Hours | Hours | Tons |
| Maryland | | | | | : Inter- : mediate | 120 | 80 | 40 | 4.9 |
| Virginia | | | | | : Second : early | 130 | 95 | 35 | 4.3 |
| | | | | | : Inter- : mediate | 140 | 100 | 40 | 4.6 |
| | | | | | : Fall | 125 | 90 | 35 | 4.2 |
| North Carolina | | | | | : Second : early | 115 | 70 | 45 | 4.4 |
| | | | | | : Inter- : mediate | 120 | 65 | 55 | 5.4 |
| | | | | | : Fall | 130 | 65 | 65 | 3/6.5 |
| South Carolina | | | | | : Second : early | 145 | 80 | 65 | 8.2 |
| | | | | | : Fall | 130 | 75 | 55 | 7.0 |
| Georgia | | | | | : Second : early | 130 | 80 | 50 | 4.9 |
| | | | | | : Inter- : mediate | 120 | 75 | 45 | 4.6 |
| Florida | | | | | : Early | 145 | 100 | 45 | 5.8 |
| So. Atlantic | | | | | : All | 132 | 85 | 47 | 5.4 |
| Kentucky | | | | | : Inter- : mediate | 125 | 70 | 55 | 5.4 |
| Tennessee | | | | | : Inter- : mediate | 130 | 70 | 60 | 6.0 |
| Alabama | | | | | : Second : early | 125 | 65 | 60 | 5.7 |
| Mississippi | | | | | : Second : early | 120 | 65 | 55 | 4.9 |
| E.S. Central | | | | | : All | 124 | 67 | 57 | 5.4 |

CABBAGE: Labor requirements per acre 1/ - Continued

| State | For processing <u>2/</u> | | | | For fresh consumption | | | |
|------------------------|--------------------------|---------|-----------|----------|-----------------------|----------|------------|----------|
| | Man hours | | :1930-39: | | Man hours | | :1930-39 | |
| | per acre | | :average: | | per acre | | :average | |
| | : Total: | : Pre-: | : Har-: | : yield: | : group-: | : Pre-: | : Har-: | : yield: |
| | : harvest: | : vest: | : vest: | : per | : ing | : Total: | : harvest: | : vest: |
| | : : : | : : : | : : : | : acre | : : : | : : : | : : : | : acre |
| | : Hours | : Hours | : Hours | : Tons | : Group | : Hours | : Hours | : Hours |
| | | | | | | | | |
| Louisiana | | | | | : Second | | | |
| | | | | | : early | 120 | 70 | 50 |
| Texas | | | | | : Early | 100 | 50 | 50 |
| W.S. Central | | | | | : All | 102 | 52 | 50 |
| Colorado | : 110 | 50 | 60 | 10.2 | : Late | 120 | 50 | 70 |
| | | | | | : Inter- | | | |
| New Mexico | | | | | : mediate | 100 | 55 | 45 |
| | | | | | : Late | 130 | 50 | 80 |
| Utah | | | | | : All | 117 | 50 | 67 |
| Mountain | : 110 | 50 | 60 | 10.2 | : Inter- | | | |
| | | | | | : mediate | 85 | 50 | 35 |
| Washington | : 105 | 50 | 55 | 8.9 | : Late | 105 | 50 | 55 |
| Oregon | | | | | : Early | 85 | 35 | 50 |
| California | | | | | : All | 88 | 39 | 49 |
| Pacific | : 105 | 50 | 55 | 8.9 | : All | 88 | 39 | 49 |
| Other States <u>2/</u> | : 90 | 50 | 40 | 6.7 | | | | |
| United States | : 94 | 49 | 45 | 7.9 | : All | 109 | 59 | 50 |

1/ Commercial areas.

2/ The States listed produce about 90 percent of the commercial cabbage acreage grown for processing. The other 10 percent is grown in Iowa, Maryland, New Jersey, North Carolina, Oregon, Pennsylvania, Tennessee, Texas, Utah, and Virginia.

3/ Short-time average.

CANTALOUPEs: Labor requirements per acre 1/

| State | Man hours per acre | | 1930-39 | | Seasonal grouping |
|--------------------|--------------------|-------------|---------|----------------|----------------------|
| | | | average | | |
| | Total | Pre-harvest | Harvest | yield per acre | |
| | Hours | Hours | Hours | Crates 2/ | Group |
| New Jersey | 110 | 50 | 60 | 104 | Late |
| Ohio | 115 | 60 | 55 | 98 | Late |
| Indiana | 90 | 50 | 40 | 79 | Intermediate |
| Illinois | 95 | 50 | 45 | 69 | Intermediate |
| Michigan | 110 | 50 | 60 | 114 | Late |
| East North Central | 98 | 50 | 48 | 92 | All |
| Iowa | 100 | 55 | 45 | 85 | Late |
| Kansas | 105 | 60 | 45 | 84 | Late |
| West North Central | 101 | 56 | 45 | 85 | Late |
| Delaware | 115 | 60 | 55 | 110 | Intermediate |
| Maryland | 110 | 60 | 50 | 97 | Intermediate |
| North Carolina | 110 | 70 | 40 | 72 | Second early |
| South Carolina | 115 | 70 | 45 | 76 | Second early |
| Georgia | 110 | 70 | 40 | 60 | Second early |
| Florida | 110 | 70 | 40 | 62 | Early |
| South Atlantic | 111 | 66 | 45 | 85 | All |
| Tennessee | 115 | 70 | 45 | 31/73 | Intermediate |
| Arkansas | 105 | 70 | 35 | 58 | Second early |
| Oklahoma | 110 | 70 | 40 | 72 | Second early |
| Texas | 80 | 45 | 35 | 63 | Second early |
| West South Central | 94 | 58 | 36 | 63 | Second early |
| Colorado | 140 | 65 | 75 | 154 | Late |
| New Mexico | 125 | 65 | 60 | 115 | Intermediate |
| Arizona | 135 | 65 | 70 | 136 | Second early |
| Utah | 130 | 65 | 65 | 3/125 | Late |
| Nevada | 120 | 65 | 55 | 106 | Second early |
| Mountain | 136 | 65 | 71 | 141 | All |
| Washington | 125 | 50 | 75 | 146 | Intermediate |
| Oregon | 135 | 55 | 80 | 158 | Late |
| California | 115 | 40 | 75 | 143 | Early (Imperial) |
| | 140 | 40 | 100 | 183 | Second early |
| Pacific | 122 | 41 | 81 | 153 | All |
| United States | 116 | 54 | 62 | 121 | All |

1/ Commercial areas. Includes Honey Ball, Honey melon, Casaba, and Persian melons not separately reported.

2/ Crate 60 pounds (standard).

3/ Short-time average.

CARROTS: Labor requirements per acre 1/

| State | Man hours per acre | | | 1930-39 | |
|--------------------|--------------------|-------------|---------|---------------|-------------------|
| | Total | Pre-harvest | Harvest | average yield | Seasonal grouping |
| | Hours | Hours | Hours | Bushels 2/ | Group |
| New York | 325 | 85 | 240 | 475 | Late |
| New Jersey | 300 | 95 | 205 | 290 | Intermediate |
| Pennsylvania | 285 | 85 | 200 | 404 | Late |
| Middle Atlantic | 311 | 89 | 222 | 400 | All |
| Ohio | 335 | 85 | 250 | 510 | Late |
| Indiana | 300 | 85 | 215 | 425 | Late |
| Illinois | 300 | 85 | 215 | 427 | Late |
| Michigan | 365 | 90 | 275 | 552 | Late |
| East North Central | 342 | 87 | 255 | 509 | Late |
| Minnesota | 280 | 85 | 195 | 387 | Late |
| Virginia | 305 | 105 | 200 | 254 | Intermediate |
| North Carolina | 290 | 130 | 160 | 200 | Intermediate |
| South Atlantic | 294 | 123 | 171 | 230 | All |
| Mississippi | 214 | 100 | 114 | 114 | Second early |
| Louisiana | 220 | 100 | 120 | 120 | Second early |
| Texas | 240 | 90 | 150 | 160 | Early |
| West South Central | 235 | 92 | 143 | 152 | All |

- Continued -

CARROTTS: Labor requirements per acre 1/ - Continued

| State | Man hours per acre | | | 1930-39 | Seasonal grouping |
|---------------|--------------------|---------|---------|------------|----------------------|
| | Pre-harvest | | | average | |
| | Total | harvest | Harvest | yield | |
| | | | | per acre | |
| | Hours | Hours | Hours | Bushels 2/ | Group |
| Colorado | 255 | 120 | 135 | 220 | Late |
| Arizona | 300 | 110 | 190 | 285 | Early |
| | 300 | 105 | 195 | 3/ 275 | Second early |
| Mountain | 289 | 110 | 179 | 267 | All |
| Washington | 350 | 130 | 220 | 400 | Late |
| Oregon | 375 | 130 | 245 | 448 | Late |
| California | 370 | 80 | 290 | 478 | Second early |
| | 375 | 70 | 305 | 508 | Fall |
| Pacific | 372 | 79 | 293 | 491 | All |
| United States | 324 | 86 | 238 | 358 | All |

1/ Commercial areas. Includes undetermined quantities used for processing in some States.

The early carrot crop is usually handled as bunched carrots, and the late, or storage crop, is usually handled in bulk or in crates, baskets and sacks. Sometimes the early pulling, in reality a thinning process, is marketed in bunches, and the remainder is marketed in bulk.

2/ Bushels of 50 pounds.

3/ 1939 yield.

CAULIFLOWER: Labor requirements per acre 1/

| State | Man hours per acre | | 1930-39 | | Seasonal grouping |
|-----------------|--------------------|-------------|---------|------------|----------------------|
| | | | average | | |
| | Total | Pre-harvest | Harvest | per acre | |
| | Hours | Hours | Hours | Crates, 2/ | Group |
| New York | 320 | 230 | 90 | 181 | Late |
| | 310 | 200 | 110 | 249 | Long Island Late |
| New Jersey | 315 | 230 | 85 | 171 | Late |
| Middle Atlantic | 313 | 215 | 98 | 214 | Late |
| Texas | 175 | 80 | 95 | 184 | Fall & winter |
| Colorado | 190 | 80 | 110 | 249 | Late |
| Arizona | 200 | 80 | 120 | 264 | Fall & winter |
| Utah | 295 | 120 | 175 | 3/ 415 | Late |
| Mountain | 195 | 81 | 114 | 257 | All |
| Washington | 230 | 100 | 130 | 333 | Late |
| Oregon | 220 | 100 | 120 | 291 | Fall |
| | 205 | 120 | 85 | 174 | Spring |
| California | 165 | 50 | 115 | 264 | Fall & winter |
| | 175 | 55 | 120 | 281 | Spring |
| Pacific | 175 | 57 | 118 | 275 | All |
| United States | 224 | 113 | 111 | 255 | All |

1/ Commercial area.

2/ In terms of crates containing approximately 37 pounds ($1\frac{1}{2}$ bushels).

3/ 1928-37 average.

CELERY: Labor requirements per acre 1/

| State | Man hours per acre | | | | | 1930-39 : average : Seasonal yield : grouping |
|-----------------|-----------------------------|-------|-------|-----------|-----------------|---|
| | : Pre- : Harvest: per acre: | | | | | |
| | Hours | Hours | Hours | Crates 2/ | Group | |
| New York | 370 | 220 | 150 | 320 | Intermediate | |
| | 555 | 190 | 165 | 326 | Late | |
| New Jersey | 330 | 220 | 110 | 214 | Intermediate | |
| | 295 | 190 | 105 | 206 | Late | |
| Pennsylvania | 315 | 185 | 130 | 256 | Late | |
| Middle Atlantic | 342 | 196 | 146 | 291 | All | |
| Ohio | 305 | 180 | 125 | 3/253 | Intermediate | |
| | 280 | 170 | 110 | 218 | Late | |
| Indiana | 295 | 175 | 120 | 236 | Intermediate | |
| | 265 | 165 | 100 | 200 | Late | |
| Michigan | 315 | 185 | 130 | 271 | Intermediate | |
| | 285 | 175 | 110 | 217 | Late | |
| E. N. Central | 293 | 177 | 116 | 235 | All | |
| Florida | 425 | 225 | 200 | 291 | Early | |
| | 500 | 275 | 225 | 277 | Second early | |
| Colorado | 300 | 195 | 105 | 236 | Late | |
| Utah | 285 | 175 | 110 | 224 | Late | |
| Mountain | 296 | 190 | 106 | 233 | Late | |
| Washington | 350 | 150 | 200 | 438 | Late | |
| Oregon | 380 | 185 | 195 | 434 | Late | |
| California | 240 | 110 | 130 | 185 | Fall and winter | |
| | 310 | 120 | 190 | 427 | Early | |
| | 340 | 125 | 215 | 526 | Second early | |
| Pacific | 275 | 118 | 157 | 279 | All | |
| United States | 324 | 171 | 153 | 272 | All | |

1/ Commercial areas.

2/ Two-thirds size (New York) crate 90 pounds.

3/ Short-time average.

CUCUMBERS: Labor requirements per acre 1/

| State | For processing | | | | For fresh consumption | | | | |
|---------------|--------------------------|----------|--------------------------------|------------|-----------------------|----------|-------|-------|------------|
| | Man hours | :1930-39 | | | Man hours | :1930-39 | | | |
| | per acre | :average | Seasonal: | | per acre | :average | | | |
| | : Pre- : Har- : yield | | group- : : Pre- : Har- : yield | | | | | | |
| | Total:harvest: vest: per | | ing :Total:harvest: vest: per | | | | | | |
| | : : : acre | | | | : : : acre | | | | |
| | Hours | Hours | Hours | Bushels 2/ | Group | Hours | Hours | Hours | Bushels 2/ |
| Massachusetts | 115 | 45 | 70 | 128 | | | | | |
| New York | 105 | 45 | 60 | 96 | Late | 120 | 45 | 75 | 121 |
| New Jersey | | | | | Inter- mediate | 150 | 70 | 80 | 160 |
| Mid.Atlantic | 105 | 45 | 60 | 96 | All | 134 | 57 | 77 | 144 |
| Ohio | 80 | 40 | 40 | 54 | Inter- mediate | 80 | 40 | 40 | 3/ 47 |
| Indiana | 75 | 40 | 35 | 48 | | | | | |
| Illinois | 82 | 40 | 42 | 58 | Inter- mediate | 90 | 40 | 50 | 64 |
| Michigan | 90 | 50 | 40 | 56 | Late | 115 | 50 | 65 | 89 |
| Wisconsin | 90 | 50 | 40 | 55 | | | | | |
| E.W.Central | 87 | 48 | 39 | 54 | All | 98 | 43 | 55 | 73 |
| Minnesota | 80 | 40 | 40 | 54 | | | | | |
| Iowa | 72 | 40 | 32 | 44 | | | | | |
| Missouri | 65 | 40 | 25 | 33 | | | | | |
| W.N.Central | 71 | 40 | 31 | 45 | | | | | |

- Continued -

CUCUMBERS: Labor requirements per acre 1/ - Continued

| State | For processing | | | | | For fresh consumption | | | | | |
|----------------|---------------------|--------------|--------------|----------------|-----------|-----------------------|-------------------|--------------|--------------|----------------|-----------|
| | Man hours : 1930-39 | | | | | Man hours : 1930-39 | | | | | |
| | per acre : average | | | | | Seasonal: | per acre: average | | | | |
| | : Pre- : | Har- : | yield : | | | group- : | : Pre- : | Har- : | yield : | | |
| | Total:harvest: | vest: | per | | | ing | Total:harvest: | vest: | per | | |
| | : : | : : | : acre | | | : : | : : | : : | : acre | | |
| | <u>Hours</u> | <u>Hours</u> | <u>Hours</u> | <u>Bushels</u> | <u>2/</u> | <u>Group</u> | <u>Hours</u> | <u>Hours</u> | <u>Hours</u> | <u>Bushels</u> | <u>2/</u> |
| Delaware | | | | | | Inter- mediate | 115 | 50 | 65 | 109 | |
| Maryland | 115 | 60 | 55 | 86 | | Inter- mediate | 130 | 60 | 70 | 114 | |
| Virginia | 95 | 50 | 45 | 72 | | Second early | 130 | 70 | 60 | 96 | |
| North Carolina | 110 | 50 | 60 | 100 | | Second early | 110 | 60 | 50 | 71 | |
| South Carolina | 95 | 50 | 45 | <u>3/</u> 72 | | Second early | 110 | 60 | 50 | 70 | |
| Georgia | | | | | | Early | 100 | 50 | 50 | 72 | |
| | | | | | | Late | 80 | 45 | 35 | 50 | |
| Florida | | | | | | Early | 140 | 80 | 60 | 88 | |
| | | | | | | Fall | 115 | 60 | 55 | 77 | |
| So. Atlantic | 104 | 52 | 52 | 85 | | All | 118 | 63 | 55 | 81 | |
| Alabama | | | | | | Early | 150 | 50 | 100 | 170 | |
| Arkansas | | | | | | Second early | 115 | 60 | 55 | 80 | |
| Louisiana | 85 | 50 | 35 | 50 | | Early | 115 | 60 | 55 | 79 | |
| | | | | | | Late | 115 | 50 | 65 | 92 | |
| Texas | 80 | 50 | 30 | 42 | | Early | 100 | 60 | 40 | 59 | |
| | | | | | | Fall | 80 | 50 | 30 | <u>3/</u> 34 | |
| W.S. Central | 80 | 50 | 30 | 44 | | All | 105 | 58 | 47 | 64 | |
| Colorado | 110 | 45 | 65 | 163 | | | | | | | |

- Continued -

CUCUMBERS: Labor requirements per acre 1/ - Continued

| State | For processing | | | | | For fresh consumption | | | | | |
|----------------|----------------|----------|----------|---------|-----------|-----------------------|----------|---------|-------|-----------|----|
| | Man hours | | 1930-39: | | Seasonal: | Man hours | | 1930-39 | | Seasonal: | |
| | per acre | | average: | | | per acre | | average | | | |
| | Pre- | Har- | yield | group- | Pre- | Har- | yield | group- | | | |
| | Total: | harvest: | vest: | per | ing | Total: | harvest: | vest: | per | | |
| | Hours | Hours | Hours | Bushels | 2/ | Group | Hours | Hours | Hours | Bushels | 2/ |
| Washington | 115 | 50 | 65 | 164 | : | : | : | : | : | : | : |
| Oregon | 115 | 50 | 65 | 166 | : | : | : | : | : | : | : |
| California | 110 | 30 | 80 | 192 | : | Early | 125 | 40 | 85 | 166 | : |
| Pacific | 112 | 38 | 74 | 182 | : | Early | 125 | 40 | 85 | 166 | : |
| All other 1/ | 90 | 50 | 40 | 53 | : | : | : | : | : | : | : |
| United States: | 87 | 46 | 41 | 66 | : | All | 119 | 59 | 60 | 92 | : |

1/ Commercial areas. The States listed produced in 1939 about 73 percent of the commercial cucumber acreage for processing. The remaining 27 percent was produced in Alabama, Arizona, Arkansas, Connecticut, Delaware, Florida, Georgia, Idaho, Kentucky, Maine, Mississippi, Nebraska, New Jersey, Oklahoma, Pennsylvania, Utah, and Wyoming.

From 0.5 to 0.7 hour is usually required to harvest and deliver to market or processing plant a bushel of cucumbers. Under most favorable conditions the requirement is only 0.4 hour per bushel. Sometimes the average is about 0.8 hour per bushel.

2/ Bushels of 48 pounds.

3/ Short-time average.

ONIONS: Labor requirements per acre 1/

| State | Man hours per acre | | | | |
|--------------------|--|----------|-------|-----------|-----------------|
| | : 1930-39 : | | | | |
| | : Pre- : : average : Seasonal | | | | |
| | : Total : harvest : Harvest : yield : grouping | | | | |
| | : per acre: | | | | |
| | Hours | Hours 2/ | Hours | Sacks 3/- | Group |
| Massachusetts | 375 | 175 | 200 | 222 | Late |
| New York | 380 | 180 | 200 | 237 | Late |
| New Jersey | 305 | 160 | 145 | 132 | Intermediate |
| Pennsylvania | 320 | 160 | 160 | 158 | Late |
| Middle Atlantic | 366 | 176 | 190 | 212 | All |
| Ohio | 265 | 140 | 125 | 136 | Late |
| Indiana | 280 | 140 | 140 | 158 | Late |
| Illinois | 245 | 135 | 110 | 108 | Late |
| Michigan | 280 | 140 | 140 | 177 | Late |
| Wisconsin | 280 | 150 | 130 | 164 | Late |
| East North Central | 278 | 141 | 137 | 162 | Late |
| Minnesota | 280 | 140 | 140 | 183 | Late |
| Iowa | 265 | 145 | 120 | 149 | Intermediate |
| | 250 | 120 | 130 | 171 | Late |
| West North Central | 276 | 139 | 137 | 174 | All |
| Virginia | 245 | 150 | 95 | 73 | Intermediate |
| Kentucky | 250 | 150 | 100 | 114 | Intermediate |
| Louisiana | 235 | 175 | 60 | 45 | Early (Bermuda) |
| Oklahoma | 205 | 135 | 70 | 4/ 59 | Intermediate |
| Texas | 220 | 170 | 50 | 42 | Early (Bermuda) |
| | 190 | 135 | 55 | 44 | N. Intermediate |
| West South Central | 214 | 162 | 52 | 43 | All |
| Idaho | 345 | 160 | 185 | 308 | Late |
| Colorado | 290 | 150 | 140 | 181 | Late |
| Utah | 320 | 150 | 170 | 248 | Late |
| Nevada | 295 | 160 | 135 | 177 | Late |
| Mountain | 311 | 153 | 158 | 186 | Late |

- Continued -

ONIONS: Labor requirements per acre 1/ - Continued

| State | Man hours per acre | | | | | 1930-39 | Seasonal |
|---------------|--------------------|----------|---------|-----------|-------------------------------|----------|----------|
| | Pre- | | | average | yield | grouping | |
| | Total | harvest | Harvest | per acre: | | | |
| | Hours | Hours 2/ | Hours | Sacks 3/ | Group | | |
| Washington | 295 | 175 | 120 | 244 | Intermediate (Walla Walla) | | |
| | 280 | 150 | 130 | 258 | Late | | |
| Oregon | 240 | 110 | 130 | 260 | Late | | |
| California | 280 | 170 | 110 | 139 | Early (Bermuda) | | |
| | 270 | 120 | 150 | 218 | Intermediate | | |
| | 240 | 110 | 130 | 179 | Late | | |
| Pacific | 254 | 124 | 130 | 204 | All | | |
| United States | 260 | 156 | 104 | 116 | All | | |

1/ Commercial producing areas.

2/ Preharvest man hours of labor vary considerably according to the method of planting. Three principal methods are used: 1. Sowing seed directly in the row in the field. This method requires a minimum of labor. Late onion production is usually planted by this method; 2. Sowing seed in an especially prepared seedbed and transplanting. This procedure is generally followed in sections where onions for early shipment are produced, and requires considerably more labor than method 1; 3. The intermediate onion crop is produced chiefly from transplanted seedlings and dry sets. This method requires about the same amount of labor as method 2.

3/ Sacks of 100 pounds.

4/ Short-time average.

PEAS, GREEN: Labor requirements per acre 1/

| State | Processed <u>2/</u> | | | | Fresh market | | | | |
|----------------|---------------------|--------|-----------|-----------------|--------------|--------|------------|---------|--------------|
| | Man hours | | :1930-39: | | Man hours | | :1930-39: | | |
| | per acre | | :average: | | per acre | | :average: | | |
| | : Pre- | : Har- | : yield | : | : Pre- | : Har- | : yield | : | Seasonal |
| | :Total:harvest: | vest: | per | :Total:harvest: | vest: | per | : grouping | | |
| | : : : : acre | : | : | : : : : acre | : | : | : | : | |
| | :Hours | Hours | Hours | Pounds | :Hours | Hours | Hours | Bushels | Group |
| Maine | : 30 | 15 | 15 | 1,900 | : | | | | |
| New York | : 25 | 10 | 15 | 1,280 | : 140 | 15 | 125 | 83 | Late |
| New Jersey | : 100 | 15 | 85 | 57 | | | | | Inter- |
| Pennsylvania | : 30 | 12 | 18 | 1,750 | : | | | | mediate |
| Mid.Atlantic | : 25 | 10 | 15 | 1,330 | : 128 | 15 | 113 | 74 | All |
| Ohio | : 20 | 10 | 10 | 1,210 | : | | | | |
| Indiana | : 20 | 8 | 12 | 1,700 | : | | | | |
| Illinois | : 18 | 8 | 10 | 1,390 | : | | | | |
| Michigan | : 20 | 10 | 10 | 1,290 | : | | | | |
| Wisconsin | : 20 | 10 | 10 | 1,330 | : | | | | |
| E.N.Central | : 20 | 10 | 10 | 1,347 | : | | | | |
| Minnesota | : 22 | 10 | 12 | 1,500 | : | | | | |
| Iowa | : 20 | 8 | 12 | 1,650 | : | | | | |
| W.N.Central | : 22 | 10 | 12 | 1,512 | : | | | | |
| Delaware | : 20 | 10 | 10 | 1,290 | : | | | | |
| Maryland | : 22 | 10 | 12 | 1,570 | : 95 | 15 | 80 | 53 | Intermediate |
| Virginia | : 25 | 12 | 13 | 1,820 | : 100 | 15 | 85 | 59 | Intermediate |
| North Carolina | : | | | | : 120 | 20 | 100 | 68 | Intermediate |
| South Carolina | : | | | | : 100 | 20 | 80 | 45 | Second early |
| Florida | : | | | | : 120 | 20 | 100 | 65 | Early |
| So.Atlantic | : 22 | 10 | 12 | 1,576 | : 110 | 19 | 91 | 59 | All |
| Alabama | : | | | | : 125 | 25 | 100 | 3/65 | Second early |
| Mississippi | : | | | | : 130 | 30 | 100 | 65 | Second early |
| E.S.Central | : | | | | : 130 | 30 | 100 | 65 | Second early |
| Louisiana | : | | | | : 120 | 30 | 90 | 54 | Second early |
| Texas | : | | | | : 110 | 20 | 90 | 58 | Early |
| W.S.Central | : | | | | : 113 | 23 | 90 | 57 | All |

PEAS, GREEN: Labor requirements per acre 1/ - Continued

| State | Processed <u>2/</u> | | | | Fresh market | | | | |
|-----------------|---------------------|---------------|---------------|----------------------|----------------------|---------------|---------------|----------------------|----------------------|
| | Man hours :1930-39: | | | | Man hours :1930-39 : | | | | Seasonal grouping |
| | per acre :average: | | | | per acre : average: | | | | |
| | Pre- Total: | Har- vest: | Har- vest: | yield per acre | Pre- Total: | Har- vest: | Har- vest: | yield per acre | |
| | Hours | Hours | Hours | Pounds | Hours | Hours | Hours | Bushels | |
| Idaho | | | | | 140 | 30 | 110 | 3/106 | Intermediate |
| | | | | | 120 | 25 | 95 | 90 | Late |
| Colorado | 35 | 20 | 15 | 1,720 | 115 | 25 | 90 | 82 | Late |
| New Mexico | | | | | 110 | 25 | 85 | 3/ 70 | Late |
| Arizona | | | | | 180 | 25 | 155 | 3/132 | Late |
| Utah | 45 | 20 | 25 | 2,440 | 190 | 25 | 165 | 3/140 | Late |
| Mountain | 42 | 20 | 22 | 2,272 | 124 | 25 | 99 | 91 | All |
| Washington | 30 | 5 | 25 | 2,230 | 220 | 20 | 200 | 188 | Late |
| Oregon | 18 | 5 | 13 | 3/1,420 | 160 | 20 | 140 | 118 | Late |
| California | | | | | | | | | |
| Imperial | 50 | 30 | 20 | 2,210 | 135 | 45 | 90 | 87 | Early |
| | | | | | 100 | 45 | 55 | 43 | Late |
| Other | | | | | 120 | 45 | 75 | 68 | Second early |
| | | | | | 150 | 45 | 105 | 101 | |
| Pacific | 26 | 6 | 20 | 1,926 | 132 | 43 | 89 | 80 | All |
| Other <u>2/</u> | 40 | 25 | 15 | 1,960 | | | | | |
| United States: | 24 | 10 | 14 | 1,500 | 126 | 33 | 93 | 77 | All |

1/ Commercial producing areas.

2/ The States listed produced in 1939 about 95 percent of the commercial pea acreage used for processing. The remaining 5 percent was produced in Arkansas, Idaho, Kansas, Montana, Nebraska, New Jersey, Oklahoma, Tennessee, Texas and Wyoming.

3/ Short-time average.

PEPPERS (GREEN, PIMIENTO, CHILLI): Labor requirements per acre 1/

| | | | | | | |
|----------------|---|----------------------------|----------|-----|------------|--------------|
| | : | Man hours per acre | | : | 1930-39 | : |
| | : | | | : | average | : |
| State | : | : | Pre- | : | yield | : |
| | : | : | harvest | : | Harvest | : |
| | : | : | per acre | : | | : |
| | : | Hours | Hours | : | Bushels 2/ | Group |
| | : | | | | | |
| | : | <u>GREEN PEPPERS</u> | | | | |
| | : | | | | | |
| New Jersey | : | 150 | 90 | 60 | 249 | Intermediate |
| | : | | | | | |
| North Carolina | : | 120 | 60 | 60 | 172 | Intermediate |
| South Carolina | : | 125 | 60 | 65 | 198 | Second early |
| Georgia | : | 110 | 60 | 50 | 152 | Second early |
| Florida | : | 235 | 160 | 75 | 216 | Fall |
| | : | 265 | 180 | 85 | 251 | Early |
| South Atlantic | : | 225 | 148 | 77 | 231 | All |
| | : | | | | | |
| Mississippi | : | 130 | 90 | 40 | 99 | Second early |
| | : | | | | | |
| Louisiana | : | 170 | 110 | 60 | 182 | Second early |
| Texas | : | 120 | 80 | 40 | 119 | Fall |
| W. S. Central | : | 139 | 91 | 48 | 151 | All |
| | : | | | | | |
| California | : | 125 | 55 | 70 | 279 | Intermediate |
| | : | | | | | |
| United States | : | 177 | 111 | 66 | 227 | All |
| | : | | | | | |
| | : | | | | | |
| | : | <u>PROCESSED PIMIENTOS</u> | | | | |
| | : | (Tons) | | | | |
| Georgia | : | 90 | 60 | 30 | 1.25 | |
| | : | | | | | |
| | : | | | | | |
| California | : | 110 | 55 | 55 | 3.08 | |
| | : | | | | | |
| United States | : | 91 | 60 | 31 | 1.46 | |
| | : | | | | | |
| | : | | | | | |
| | : | <u>CHILLI PEPPERS</u> | | | | |
| | : | (Pounds) | | | | |
| New Mexico 3/ | : | 284 | 195 | 889 | 4/ 443 | |

1/ Commercial areas.

2/ Bushels of 25 pounds net.

3/ Results of study reported in New Mexico Agricultural Experiment Station Bulletin No. 215, June, 1933.

4/ Air dry weight.

POTATOES (SWEET): Labor requirements per acre 1/

| State | Man hours per acre | | | 1930-39 |
|--------------------|--------------------|---------|---------|----------|
| | | | | average |
| | Pre- harvest | | | yield |
| | Total | harvest | Harvest | per acre |
| | Hours | Hours | Hours | Bushels |
| New Jersey | 160 | 70 | 90 | 141 |
| Indiana | 110 | 45 | 65 | 102 |
| Illinois | 100 | 45 | 55 | 85 |
| East North Central | 103 | 45 | 58 | 92 |
| Iowa | 100 | 45 | 55 | 86 |
| Missouri | 95 | 45 | 50 | 79 |
| Kansas | 110 | 55 | 55 | 88 |
| West North Central | 98 | 46 | 52 | 82 |
| Delaware | 135 | 70 | 65 | 123 |
| Maryland | 140 | 70 | 70 | 132 |
| Virginia | 130 | 70 | 60 | 111 |
| North Carolina | 120 | 70 | 50 | 96 |
| South Carolina | 120 | 70 | 50 | 85 |
| Georgia | 115 | 70 | 45 | 72 |
| Florida | 110 | 70 | 40 | 66 |
| South Atlantic | 119 | 70 | 49 | 87 |
| Kentucky | 110 | 65 | 45 | 83 |
| Tennessee | 112 | 65 | 47 | 88 |
| Alabama | 114 | 70 | 44 | 80 |
| Mississippi | 115 | 70 | 45 | 87 |
| East South Central | 114 | 69 | 45 | 84 |
| Arkansas | 105 | 65 | 40 | 73 |
| Louisiana | 110 | 70 | 40 | 70 |
| Oklahoma | 100 | 65 | 35 | 61 |
| Texas | 105 | 65 | 40 | 71 |
| West South Central | 107 | 67 | 40 | 70 |
| California | 110 | 50 | 60 | 108 |
| United States | 114 | 68 | 46 | 83 |

1/ Includes yams. Labor for growing sweetpotato plants and for marketing the crop is included. About 94 percent of the California acreage was irrigated.

POTATOES (WHITE) Labor requirements per acre 1/

| State | Man hours per acre | | | 1930-39 |
|--------------------|--------------------|-------------|---------|------------------------|
| | Total | Pre-harvest | Harvest | average yield per acre |
| | Hours | Hours | Hours | Bushels |
| Maine | 84 | 44 | 40 | 263 |
| New Hampshire | 84 | 43 | 36 | 156 |
| Vermont | 83 | 48 | 35 | 136 |
| Massachusetts | 84 | 50 | 34 | 140 |
| Rhode Island | 84 | 46 | 33 | 177 |
| Connecticut | 80 | 44 | 36 | 163 |
| New England | 84 | 45 | 39 | 232 |
| New York | 73 | 38 | 35 | 126 |
| New Jersey | 65 | 29 | 36 | 168 |
| Pennsylvania | 85 | 45 | 40 | 120 |
| Middle Atlantic | 77 | 40 | 37 | 128 |
| Ohio | 68 | 40 | 28 | 98 |
| Indiana | 60 | 33 | 27 | 87 |
| Illinois | 54 | 29 | 25 | 76 |
| Michigan | 70 | 40 | 30 | 95 |
| Wisconsin | 71 | 42 | 29 | 85 |
| East North Central | 68 | 39 | 29 | 90 |
| Minnesota | 51 | 29 | 22 | 76 |
| Iowa | 51 | 29 | 22 | 77 |
| Missouri | 51 | 23 | 23 | 77 |
| North Dakota | 48 | 26 | 22 | 73 |
| South Dakota | 42 | 24 | 18 | 53 |
| Nebraska | 43 | 23 | 20 | 81 |
| Kansas | 49 | 26 | 23 | 78 |
| West North Central | 49 | 27 | 22 | 75 |
| Delaware | 62 | 36 | 26 | 37 |
| Maryland | 65 | 38 | 27 | 100 |
| Virginia | 67 | 38 | 29 | 112 |
| West Virginia | 81 | 51 | 30 | 79 |
| North Carolina | 73 | 38 | 35 | 100 |
| South Carolina | 82 | 46 | 36 | 115 |
| Georgia | 71 | 46 | 25 | 66 |
| Florida | 66 | 35 | 31 | 111 |
| South Atlantic | 71 | 40 | 31 | 101 |

- Continued -

POTATOES (WHITE:) Labor requirements per acre 1/ - Continued

| State | Man hours per acre | | | 1930-39 |
|--------------------|--------------------|-------------|---------|----------|
| | | | | average |
| | | | | yield |
| | Total | Pre-harvest | Harvest | per acre |
| | Hours | Hours | Hours | Bushels |
| Kentucky | 59 | 33 | 26 | 75 |
| Tennessee | 59 | 33 | 26 | 68 |
| Alabama | 71 | 44 | 27 | 87 |
| Mississippi | 64 | 40 | 24 | 71 |
| East South Central | 63 | 37 | 26 | 76 |
| Arkansas | 65 | 40 | 25 | 73 |
| Louisiana | 63 | 40 | 23 | 61 |
| Oklahoma | 58 | 35 | 23 | 71 |
| Texas | 58 | 35 | 23 | 64 |
| West South Central | 61 | 38 | 23 | 67 |
| Montana | 52 | 27 | 25 | 90 |
| Idaho | 76 | 36 | 40 | 224 |
| Wyoming | 54 | 29 | 25 | 83 |
| Colorado | 64 | 34 | 30 | 143 |
| New Mexico | 70 | 45 | 25 | 72 |
| Arizona | 71 | 45 | 26 | 84 |
| Utah | 78 | 46 | 32 | 152 |
| Nevada | 71 | 40 | 31 | 144 |
| Mountain | 69 | 35 | 34 | 165 |
| Washington | 83 | 45 | 38 | 170 |
| Oregon | 90 | 50 | 40 | 151 |
| California | 103 | 48 | 55 | 243 |
| Pacific | 94 | 48 | 46 | 190 |
| United States | 68 | 37 | 31 | 112 |

1/ "Harvest hours" include whatever sorting and grading was done by the farmer, and hauling to market. In some cases the labor for storing potatoes on the farm and later hauling to market is included. In the principal commercial areas where yields are good one man working 10 hours will pick up from 80 to 125 bushels, depending on yield, size of potatoes, condition of land, type of digger used, and disposal of the potatoes by the "picker." In low producing areas where potatoes are not raised primarily for market a day's work in picking up is usually 50 to 60 bushels. In commercial areas, picking up generally represents 40 to 50 percent of the hours devoted to harvesting, and marketing the crop.

According to the 1940 census, the following percentages of the potato acreages were irrigated: Montana, 55 percent; Idaho, 70 percent; Wyoming, 66 percent; Colorado, 94 percent; New Mexico, 50 percent; Arizona, 75 percent; Utah, 97 percent; Nevada, 99 percent; Washington, 50 percent; Oregon, 65 percent; and California, 95 percent.

SPINACH: Labor requirements per acre 1/

| State | Man hours per acre | | | | 1930-39 | Seasonal grouping |
|-------------------|--------------------|---------|---------|------------|--------------------------|----------------------|
| | Pre-harvest | | | | average yield | |
| | Total | harvest | Harvest | per acre | | |
| | Hours | Hours | Hours | Bushels 2/ | Group | |
| FRESH CONSUMPTION | | | | | | |
| New Jersey | 155 | 55 | 100 | 345 | Second early and Late | |
| Pennsylvania | 145 | 55 | 90 | 306 | Second early and Late | |
| Mid. Atlantic | 150 | 55 | 95 | 327 | All | |
| Illinois | 80 | 45 | 35 | 139 | Second early and Late | |
| Missouri | 110 | 40 | 70 | 236 | Second early and Late | |
| Maryland | 120 | 45 | 75 | 251 | Second early and Late | |
| Virginia | 140 | 50 | 90 | 294 | Fall and Second early | |
| North Carolina | 120 | 50 | 70 | 3/ 220 | Early | |
| South Carolina | 120 | 50 | 70 | 3/ 206 | Early | |
| So. Atlantic | 135 | 49 | 86 | 277 | All | |
| Arkansas | 110 | 50 | 60 | 172 | Second early and Late | |
| Louisiana | 80 | 50 | 30 | 92 | Early | |
| Oklahoma | 105 | 40 | 65 | 190 | Second early and Late | |
| Texas | 100 | 40 | 60 | 161 | Early | |
| W. S. Central | 99 | 41 | 58 | 160 | All | |
| Colorado | 90 | 50 | 40 | 128 | Intermediate | |
| Washington | 145 | 35 | 110 | 359 | Second early and Late | |
| California | 185 | 50 | 135 | 675 | Early | |
| Pacific | 176 | 47 | 129 | 584 | All | |
| United States | 115 | 44 | 71 | 206 | All | |

SPINACH: Labor requirements per acre 1/ - Continued

[illegible]

1/ Commercial producing areas.

2/ Average weight of 18 pounds.

3/ Assumed.

4/ Short-time average.

SWEET CORN: Labor requirements per acre 1/

| State | Man hours per acre | | | 1930-39 |
|----------------------------|--------------------|-------------|---------|----------------|
| | | | | average |
| | Total | Pre-harvest | Harvest | yield per acre |
| | Hours | Hours | Hours | Tons |
| FOR PROCESSING | | | | |
| Maine | 110 | 50 | 60 | 3.7 |
| New Hampshire | 101 | 50 | 51 | 3.2 |
| Vermont | 95 | 50 | 45 | 2.6 |
| New England | 108 | 50 | 58 | 3.6 |
| New York | 50 | 25 | 25 | 2.1 |
| Pennsylvania | 47 | 25 | 22 | 1.8 |
| Middle Atlantic | 49 | 25 | 24 | 2.0 |
| Ohio | 40 | 15 | 25 | 1.9 |
| Indiana | 37 | 15 | 22 | 1.7 |
| Illinois | 40 | 12 | 28 | 2.2 |
| Michigan | 35 | 20 | 15 | 1.0 |
| Wisconsin | 43 | 20 | 23 | 2.2 |
| East North Central | 40 | 15 | 25 | 2.0 |
| Minnesota | 47 | 17 | 30 | 2.5 |
| Iowa | 42 | 12 | 30 | 2.2 |
| Nebraska | 27 | 10 | 17 | 1.3 |
| West North Central | 45 | 15 | 30 | 2.3 |
| Delaware | 45 | 25 | 20 | 2.3 |
| Maryland | 43 | 25 | 18 | 1.8 |
| South Atlantic | 43 | 25 | 18 | 1.8 |
| Tennessee | 58 | 23 | 35 | 2.8 |
| Washington | 60 | 30 | 30 | 2.4 |
| Oregon | 53 | 28 | 25 | 1.7 |
| Pacific | 57 | 29 | 28 | 2.0 |
| All other States <u>2/</u> | 55 | 25 | 30 | 2.3 |
| United States | 45 | 19 | 26 | 2.1 |
| FOR MARKET | | | | |
| New Jersey | 50 | 30 | 20 | 4,740 ears |

1/ Major commercial States produce about 98.5 percent of sweet corn processed.

2/ All other States - Arkansas, Colorado, Idaho, Kansas, Kentucky, Missouri, Montana, New Jersey, Oklahoma, South Dakota, Texas, Utah, Virginia, and Wyoming.

TOMATOES: Labor requirements per acre 1/

| State | For processing | | | | | For fresh market | | | | |
|----------------|----------------|----------|----------|--------|-------------------|------------------|----------|---------|---------|-----------|
| | Man hours | | 1930-39: | | Seasonal: | Man hours | | 1930-39 | | Seasonal: |
| | per acre | | average: | | | per acre | | average | | |
| | Pre- | Har- | yield | group- | Pre- | Har- | yield | group- | | |
| | Total: | harvest: | vest: | per | ing | Total: | harvest: | vest: | per | |
| | : | : | acre | : | : | : | : | acre | : | |
| | Hours | Hours | Hours | Tons | Group | Hours | Hours | Hours | Bushels | |
| New York | 137 | 41 | 96 | 7.4 | Late | 185 | 44 | 141 | 217 | |
| New Jersey | 115 | 44 | 71 | 5.1 | Inter- mediate | 195 | 66 | 129 | 183 | |
| Pennsylvania | 115 | 47 | 68 | 4.8 | Late | 175 | 50 | 125 | 180 | |
| Mid. Atlantic: | 122 | 44 | 78 | 5.7 | All | 189 | 56 | 133 | 194 | |
| Ohio | 115 | 38 | 77 | 5.9 | Inter. & Late | 160 | 42 | 118 | 168 | |
| Indiana | 95 | 36 | 59 | 4.2 | Late | 150 | 40 | 110 | 108 | |
| Illinois | 90 | 36 | 54 | 3.5 | Inter. & Late | 130 | 40 | 90 | 60 | |
| Michigan | 105 | 28 | 77 | 5.8 | Late | 120 | 30 | 90 | 152 | |
| E.N. Central | 100 | 36 | 64 | 4.5 | All | 141 | 38 | 103 | 115 | |
| Iowa | 85 | 32 | 53 | 3.6 | Late | 145 | 35 | 110 | 107 | |
| Missouri | 85 | 53 | 32 | 1.8 | Inter- mediate | 165 | 55 | 110 | 90 | |
| W.N. Central | 85 | 45 | 40 | 2.3 | All | 163 | 53 | 110 | 92 | |

- Continued -

TOMATOES: Labor requirements per acre 1/ - Continued

| State | For processing | | | | For fresh market | | | | |
|----------------|----------------|--------|-----------|-----------|-------------------|--------|----------|-----------|----------|
| | Man hours | | :1930-39: | | Man hours | | :1930-39 | | |
| | per acre | | :average: | | Seasonal: | | per acre | | |
| | : Pre- : | Har- : | yield : | Seasonal: | : Pre- : | Har- : | yield : | Seasonal: | per acre |
| | Total:harvest: | vest: | per | | Total:harvest: | vest: | per | | |
| | : acre | | : acre | | : acre | | : acre | | |
| | Hours | Hours | Hours | Tons | Group | Hours | Hours | Hours | Bushels |
| Delaware | 98 | 48 | 50 | 3.3 | Late | 165 | 52 | 113 | 112 |
| Maryland | 97 | 46 | 51 | 3.4 | Inter- mediate | 170 | 54 | 116 | 130 |
| Virginia | 97 | 52 | 45 | 2.8 | Inter- mediate | 175 | 61 | 114 | 126 |
| North Carolina | | | | | Inter- mediate | 165 | 81 | 84 | 42 |
| South Carolina | | | | | Second early | 180 | 85 | 95 | 63 |
| Georgia | | | | | Second early | 170 | 80 | 90 | 56 |
| Florida | | | | | All | 190 | 84 | 106 | 96 |
| So. Atlantic | 97 | 48 | 49 | 3.2 | All | 184 | 80 | 104 | 94 |
| Kentucky | 105 | 61 | 44 | 2.4 | Late | 170 | 63 | 107 | 89 |
| Tennessee | 100 | 62 | 38 | 2.1 | Inter- mediate | 185 | 64 | 121 | 112 |
| Mississippi | | | | | Second early | 200 | 79 | 121 | 111 |
| E.S.Central | 102 | 62 | 40 | 2.2 | All | 190 | 71 | 119 | 109 |
| Arkansas | 90 | 53 | 37 | 1.9 | Inter- mediate | 160 | 62 | 98 | 70 |
| Louisiana | | | | | Second early | 195 | 70 | 125 | 85 |
| Texas | | | | | All | 150 | 55 | 95 | 73 |
| W.S.Central | 90 | 53 | 37 | 1.9 | All | 153 | 56 | 97 | 73 |

2/ The States listed harvested during 1930-39 about 95 percent of the total tomato acreage used for producing tomatoes for processing. The other 5 percent was grown in the following States: Connecticut, Florida, Georgia, Idaho, Kansas, Louisiana, Minnesota, Mississippi, Nebraska, New Mexico, North Carolina, Oklahoma, Oregon, South Carolina, Texas, Washington, West Virginia, and Wisconsin.

WATERMELONS: Labor requirements per acre 1/

| State | Man hours per acre | | | 1930-39 |
|--------------------|--------------------|---------|---------|------------------|
| | | | | average |
| | Pre-harvest | | | number |
| | Total | harvest | Harvest | of melons |
| | | | | per acre |
| | Hours | Hours | Hours | Number <u>2/</u> |
| New Jersey | 70 | 40 | 30 | 444 |
| Indiana | 62 | 40 | 22 | 307 |
| Illinois | 60 | 40 | 20 | 294 |
| East North Central | 61 | 40 | 21 | 301 |
| Iowa | 55 | 40 | 15 | 242 |
| Missouri | 58 | 40 | 18 | 252 |
| West North Central | 58 | 40 | 18 | 250 |
| Delaware | 80 | 55 | 25 | 370 |
| Maryland | 80 | 55 | 25 | 338 |
| Virginia | 80 | 55 | 25 | 352 |
| North Carolina | 55 | 40 | 15 | 197 |
| South Carolina | 55 | 40 | 15 | 225 |
| Georgia | 55 | 40 | 15 | 230 |
| Florida | 55 | 35 | 20 | 269 |
| South Atlantic | 57 | 40 | 17 | 241 |
| Alabama | 60 | 40 | 20 | 297 |
| Mississippi | 60 | 40 | 20 | 259 |
| East South Central | 60 | 40 | 20 | 283 |
| Arkansas | 60 | 40 | 20 | 248 |
| Louisiana | 65 | 45 | 20 | <u>3/</u> 273 |
| Oklahoma | 65 | 50 | 15 | 188 |
| Texas | 50 | 35 | 15 | 152 |
| West South Central | 55 | 39 | 16 | 170 |
| Colorado | 75 | 50 | 25 | 313 |
| Arizona | 75 | 50 | 25 | 343 |
| Mountain | 75 | 50 | 25 | 330 |
| Washington | 70 | 40 | 30 | 455 |
| Oregon | 65 | 35 | 30 | 414 |
| California | 90 | 40 | 50 | 680 |
| Pacific | 88 | 40 | 48 | 658 |
| United States | 59 | 40 | 19 | 263 |

1/ Commercial producing areas. These States probably grow about 90 percent of the commercial watermelon acreage. Most of the remaining 10 percent is produced in Tennessee, Kansas, Ohio, Kentucky, Nebraska, Pennsylvania, and New Mexico.

2/ The weight of melons of average size is about 25 pounds each.

3/ Short-time weight.

MAPLE PRODUCTS: Labor requirements per gallon of syrup
and per pound of sugar 1/

| State | Man hours per | | 1929-38 | 1929-38 |
|--------------------|---------------|-------|----------|----------|
| | | | average | average |
| | Gallon | Pound | number | gallons |
| | of | of | of trees | of sap |
| | syrup | sugar | tapped | per tree |
| | Hours | Hours | trees | Gallons |
| Maine | 2.8 | .38 | 260 | 5.7 |
| New Hampshire | 2.4 | .32 | 382 | 8.7 |
| Vermont | 2.4 | .32 | 5,428 | 8.4 |
| Massachusetts | 1.9 | .25 | 242 | 10.6 |
| New England | 2.4 | .32 | 6,312 | 8.4 |
| New York | 2.0 | .27 | 3,259 | 9.5 |
| Pennsylvania | 1.8 | .24 | 650 | 11.7 |
| Middle Atlantic | 2.0 | .27 | 3,909 | 9.9 |
| Ohio | 1.9 | .25 | 1,201 | 10.5 |
| Michigan | 2.0 | .27 | 452 | 9.6 |
| Wisconsin | 2.0 | .27 | 275 | 9.5 |
| East North Central | 2.0 | .26 | 1,928 | 10.1 |
| Maryland | 1.4 | .20 | 58 | 17.6 |
| United States | 2.2 | .29 | 12,207 | 9.2 |

1/ Considerable variation exists among different groves and seasons in the amount of sap required to make a gallon of syrup or a pound of sugar. Frequently, 32 gallons will make on gallon of syrup or 7½ pounds of sugar. In many camps during some seasons, however, it will take as much as 50 gallons of sap to make one gallon of syrup, and one gallon of syrup will make from 6½ to 9 pounds of sugar, depending on the kind made. It was assumed that 40 gallons of sap would make one gallon of syrup or 8 pounds of sugar, in converting average production of syrup and sugar to a sap basis for determining gallons of sap per tree. The range in yield per tree is very wide, possibly from very little to 40 or 50 gallons. The average per tree in many commercial camps ranges from 10 to 20 gallons.

The amount of labor for producing syrup or sugar varies tremendously, depending on the grove and the equipment. The range may be as wide as from around one hour to 10 hours per gallon of syrup. The requirements shown above are for average commercial groves and include labor for cutting and hauling wood, and for disposing of the syrup and sugar.

SORGO SYRUP: Labor requirements per acre 1/

| State | Man hours per acre | | | 1929-38 |
|--------------------|--------------------|-------------|---------|----------|
| | | | | average |
| | | | | yield |
| | Total | Pre-harvest | Harvest | per acre |
| | Hours | Hours | Hours | Gallons |
| Indiana | 120 | 40 | 80 | 62 |
| Illinois | 120 | 40 | 80 | 61 |
| East North Central | 120 | 40 | 80 | 62 |
| Iowa | 155 | 40 | 115 | 92 |
| Missouri | 110 | 45 | 65 | 47 |
| Kansas | 105 | 45 | 60 | 42 |
| West North Central | 118 | 44 | 74 | 55 |
| Virginia | 130 | 45 | 85 | 62 |
| North Carolina | 140 | 45 | 95 | 70 |
| South Carolina | 125 | 50 | 75 | 52 |
| Georgia | 140 | 50 | 90 | 64 |
| South Atlantic | 137 | 48 | 89 | 64 |
| Kentucky | 120 | 45 | 75 | 56 |
| Tennessee | 120 | 45 | 75 | 54 |
| Alabama | 150 | 55 | 95 | 69 |
| Mississippi | 150 | 50 | 100 | 75 |
| East South Central | 139 | 50 | 89 | 65 |
| Arkansas | 115 | 45 | 70 | 49 |
| Oklahoma | 100 | 45 | 55 | 35 |
| Texas | 115 | 45 | 70 | 49 |
| West South Central | 114 | 45 | 69 | 48 |
| United States | 130 | 48 | 82 | 59 |

1/ Includes hours for cutting and hauling wood, and for making up and marketing syrup. Work on wood is included under preharvest, as most all of it is cut and gotten ready previous to the harvest season.

SUGAR BEETS: Labor requirements per acre 1/

| State | Man hours per acre | | | 1929-38 |
|--------------------|--------------------|-------------|---------|----------------|
| | | | | average |
| | Total | Pre-harvest | Harvest | yield |
| | Hours | Hours | Hours | per acre |
| Ohio | 75 | 45 | 30 | 8.4 |
| Indiana | 80 | 45 | 35 | <u>2/</u> 8.0 |
| Illinois | 80 | 45 | 35 | <u>2/</u> 8.0 |
| Michigan | 90 | 50 | 40 | 7.9 |
| Wisconsin | 90 | 45 | 45 | <u>2/</u> 8.0 |
| East North Central | 86 | 48 | 38 | 8.0 |
| Minnesota | 80 | 45 | 35 | <u>2/</u> 8.0 |
| Iowa | 80 | 45 | 35 | <u>2/</u> 8.0 |
| North Dakota | 75 | 40 | 35 | <u>2/</u> 8.0 |
| South Dakota | 75 | 40 | 35 | <u>2/</u> 8.0 |
| Nebraska | 90 | 55 | 35 | 12.6 |
| Kansas | 80 | 45 | 35 | <u>2/</u> 8.0 |
| West North Central | 84 | 49 | 35 | 10.4 |
| Montana | 95 | 55 | 40 | 12.0 |
| Idaho | 90 | 55 | 35 | 11.3 |
| Wyoming | 115 | 65 | 50 | 12.0 |
| Colorado | 95 | 55 | 40 | 12.4 |
| Arizona | 100 | 55 | 45 | <u>2/</u> 12.0 |
| Utah | 105 | 65 | 40 | 12.5 |
| Nevada | 110 | 60 | 50 | <u>2/</u> 12.0 |
| Mountain | 98 | 58 | 40 | 12.2 |
| Washington | 100 | 70 | 30 | <u>2/</u> 12.0 |
| Oregon | 85 | 55 | 30 | <u>2/</u> 12.0 |
| California | 90 | 50 | 40 | 13.0 |
| Pacific | 91 | 52 | 39 | 12.8 |
| United States | 92 | 53 | 39 | 11.2 |

1/ Practically all of the sugar beet acreage in Nebraska and the States farther west is under irrigation. The hours shown are for growing, harvesting, and hauling the beets to the beet factories.

2/ Assumed yields.

SUGAR CANE: Labor requirements per acre 1/

| State | Man hours per acre | | | | | | 1929-38 | |
|---------------|--------------------|---------|---------|---------------|---------|---------|---------------|------|
| | Cane for sugar | | | Cane for seed | | | average yield | |
| | Pre- | | | Pre- | | | per acre | |
| | Total | harvest | Harvest | Total | harvest | Harvest | cane | seed |
| | Hours | Hours | Hours | Hours | Hours | Hours | Tons | Tons |
| Florida | 315.0 | 137.0 | 178.0 | 290.0 | 137.0 | 153.0 | 31.2 | 32.8 |
| Louisiana | 232.0 | 94.0 | 138.0 | 200.0 | 94.0 | 106.0 | 16.5 | 16.6 |
| United States | 238.0 | 97.0 | 141.0 | 203.0 | 95.0 | 108.0 | 17.6 | 17.1 |

1/ Grown for sugar and products. Some molasses, including blackstrap, is obtained from the cane that is ground for sugar.

SUGAR CANE SYRUP: Labor requirements per acre 1/

| State | Man hours per acre | | | 1929-38 |
|--------------------|--------------------|-------|-------|----------|
| | Pre- | | | average |
| | Total | | | yield |
| | Hours | Hours | Hours | per acre |
| South Carolina | 230 | 85 | 145 | 99 |
| Georgia | 270 | 90 | 180 | 142 |
| Florida | 295 | 90 | 205 | 168 |
| South Atlantic | 272 | 89 | 183 | 144 |
| Alabama | 245 | 85 | 160 | 118 |
| Mississippi | 290 | 90 | 200 | 159 |
| East South Central | 267 | 87 | 180 | 138 |
| Arkansas | 230 | 85 | 145 | 105 |
| Louisiana | 380 | 100 | 280 | 248 |
| Texas | 260 | 90 | 170 | 124 |
| West South Central | 358 | 98 | 260 | 212 |
| United States | 293 | 91 | 202 | 160 |

1/ Includes cutting and hauling wood, making up and marketing syrup. Fuel work is included under preharvest, as most all wood is cut and gotten ready before the harvesting begins.

COTTON: Labor requirements per acre ^{1/}

| State | Man hours per acre | | | 1929-38 |
|--------------------|--------------------|---------|---------|----------|
| | | | | average |
| | Pre- | | | yield |
| | Total | harvest | Harvest | per acre |
| | Hours | Hours | Hours | Pounds |
| Missouri | 137 | 57 | 80 | 337 |
| Virginia | 128 | 61 | 67 | 269 |
| North Carolina | 129 | 64 | 65 | 278 |
| South Carolina | 131 | 71 | 60 | 251 |
| Georgia | 114 | 62 | 52 | 218 |
| Florida | 100 | 63 | 37 | 151 |
| South Atlantic | 122 | 65 | 57 | 239 |
| Kentucky | 120 | 60 | 60 | 2/ 250 |
| Tennessee | 121 | 61 | 60 | 250 |
| Alabama | 114 | 65 | 49 | 215 |
| Mississippi | 118 | 61 | 57 | 239 |
| East South Central | 117 | 63 | 54 | 231 |
| Arkansas | 112 | 57 | 55 | 224 |
| Louisiana | 117 | 62 | 55 | 225 |
| Oklahoma | 58 | 29 | 29 | 135 |
| Texas | 54 | 28 | 26 | 149 |
| West South Central | 69 | 36 | 33 | 163 |
| New Mexico | 124 | 46 | 78 | 420 |
| Arizona | 117 | 35 | 82 | 382 |
| Mountain | 119 | 39 | 80 | 396 |
| California | 114 | 26 | 88 | 513 |
| United States | 91 | 47 | 44 | 197 |

^{1/} These hours include labor for picking or snapping, weighing, hauling seed cotton to gin, and in some instances for marketing lint and seed. Most of the seed is disposed of at the gin. Recent cotton yields are higher than the 10-year average, and harvesting probably is nearer 50 hours per acre.

One average mature picker will pick 150 to 200 pounds of seed cotton per 10-hour day, in a good stand and yield. Cleaning up late in the season the same picker may not average over 75 to 100 pounds of seed cotton. In the High Plains Bollie District, one man will snap or strip by hand 400 to 600 pounds of seed cotton per day. On the average, it takes 1,200 to 1,500 pounds of picked seed cotton to make one 500-pound bale of lint, and 1,800 to 2,000 pounds of bollie or snapped seed cotton to make one 500-pound bale.

^{2/} Assumed.

FLAXSEED: Labor requirements per acre 1/

| State | Man hours per acre | | | 1929-38 |
|--------------------|--------------------|-------------|---------|----------|
| | | | | average |
| | Total | Pre-harvest | Harvest | yield |
| | Hours | Hours | Hours | per acre |
| Michigan | 14.0 | 6.5 | 7.5 | 8.8 |
| Wisconsin | 14.0 | 6.5 | 7.5 | 10.7 |
| East North Central | 14.0 | 6.5 | 7.5 | 9.9 |
| Minnesota | 8.6 | 3.4 | 5.2 | 8.2 |
| Iowa | 10.0 | 4.0 | 6.0 | 9.1 |
| Missouri | 12.0 | 6.5 | 5.5 | 4.2 |
| North Dakota | 6.0 | 2.6 | 3.4 | 4.3 |
| South Dakota | 5.7 | 2.3 | 3.4 | 4.2 |
| Nebraska | 5.8 | 2.3 | 3.5 | 5.5 |
| Kansas | 7.0 | 3.5 | 3.5 | 5.9 |
| West North Central | 7.9 | 3.2 | 4.7 | 7.1 |
| Oklahoma | 7.0 | 4.0 | 3.0 | 2/ 9.0 |
| Texas | 5.0 | 2.5 | 2.5 | 2/ 11.5 |
| West South Central | 5.5 | 2.9 | 2.6 | 10.9 |
| Montana | 6.0 | 2.8 | 3.2 | 3.6 |
| Idaho | 9.0 | 4.0 | 5.0 | 2/ 8.5 |
| Arizona | 15.0 | 7.0 | 8.0 | 22.0 |
| Mountain | 6.6 | 3.0 | 3.6 | 4.8 |
| Washington | 9.5 | 4.0 | 5.5 | 2/ 11.0 |
| Oregon | 9.0 | 4.0 | 5.0 | 2/ 9.0 |
| California | 12.5 | 6.5 | 6.0 | 17.3 |
| Pacific | 12.1 | 6.2 | 5.9 | 15.6 |
| United States | 8.0 | 3.3 | 4.7 | 7.5 |

1/ In 1939, 81 percent of the flaxseed acreage in California was irrigated. Labor for baling straw is not included.

2/ 1939 yield, which seemed to be a good year in several States.

HEMP: Labor requirements per acre 1/

| State | Man hours per acre <u>2/</u> | | | Average yield per acre Pounds fiber <u>3/</u> |
|-----------|------------------------------|-----------------|--------------|---|
| | Total | Pre- harvest | Harvest | |
| | <u>Hours</u> | <u>Hours</u> | <u>Hours</u> | |
| Wisconsin | 22 | 7 | 15 | 900 |

1/ Harvesting data from mimeograph report, "Hemp in Corn Belt Farming." George T. Schaefer, BAE, January 1943. States in which farmers are being asked to produce hemp are: Wisconsin, Minnesota, Illinois, Iowa, Indiana, and Kentucky.

2/ These requirements assume that the retted straw is picked up and tied by machine. If this operation is done by hand about 9 more harvest hours will be required, making the total hours per acre 31, and the harvest hours 24.

3/ A normal yield is 900 pounds of fiber, or 2 to 3 tons of retted straw. In 1941 and 1942, yields of 1,100 to 1,200 pounds of fiber per acre were common. Usually about 60 to 70 percent of the fiber is high-quality long fiber, called "line", and the remainder is short fiber, called "tow".

PEANUTS: Labor requirements per acre 1/

| State | Man hours per acre | | | | 1929-38 |
|--------------------|--------------------|-----------------|---------|-----------------------------|-----------------------|
| | Harvested for nuts | | | Harvested for hay <u>2/</u> | average yield of nuts |
| | Total | Pre- harvest | Harvest | Harvest | per acre |
| | | | | | |
| | Hours | Hours | Hours | Hours | Pounds |
| Virginia | 74 | 38 | 36 | 22 | 1,026 |
| North Carolina | 77 | 40 | 37 | 21 | 1,048 |
| South Carolina | 68 | 30 | 38 | 20 | 630 |
| Georgia | 63 | 25 | 38 | 20 | 665 |
| Florida | 70 | 34 | 36 | 20 | 578 |
| South Atlantic | 68 | 31 | 37 | 21 | 746 |
| Tennessee | 76 | 38 | 38 | 20 | 692 |
| Alabama | 69 | 36 | 33 | 18 | 648 |
| Mississippi | 70 | 33 | 37 | 18 | 530 |
| East South Central | 70 | 36 | 34 | 18 | 640 |
| Arkansas | 54 | 28 | 26 | 19 | 498 |
| Louisiana | 56 | 30 | 26 | 19 | 496 |
| Oklahoma | 50 | 26 | 24 | 18 | 470 |
| Texas | 44 | 24 | 20 | 15 | 464 |
| West South Central | 46 | 25 | 21 | 16 | 472 |
| United States | 63 | 30 | 33 | 19 | 677 |

1/ Commercial producing areas. The hours for baling peanut hay are not included. These average from 1 to 2 hours per acre. See page 22 for data on baling hay.

2/ Pulled or dug and put up for hay without threshing.

PEPPERMINT FOR OIL: Labor requirements per acre 1/

| State | Man hours per acre | | | 1929-38 |
|---------------------|--------------------|------------|---------|-------------|
| | | | | average |
| | Total | Preharvest | Harvest | yield |
| | | | | per acre |
| | Hours | Hours | Hours | Lbs. of oil |
| Ohio | 52.0 | 39.0 | 13.0 | 19.8 |
| Indiana | 51.0 | 39.0 | 12.0 | 19.1 |
| Michigan | 58.0 | 42.0 | 16.0 | 27.1 |
| East North Central: | 55.0 | 41.0 | 14.0 | 24.0 |
| Washington | 65.0 | 45.0 | 20.0 | 37.7 |
| Oregon | 65.0 | 45.0 | 20.0 | 35.6 |
| California | 70.0 | 45.0 | 25.0 | 45.0 |
| Pacific | 66.0 | 45.0 | 21.0 | 37.8 |
| United States | 57.0 | 41.0 | 16.0 | 25.8 |

1/ Harvested and delivered to distillery. Some large growers have their own distilling plants and the hours shown probably are high enough to include distilling for such operators.

BEANS, DRY EDIBLE: Labor requirements per acre 1/

| State | Man hours per acre | | | 1930-39 | Percentage |
|--------------------|--------------------|---------|---------|----------|------------|
| | | | | average | of |
| | : Pre- : | | | yield | acreage |
| | Total | harvest | Harvest | per | irrigated |
| | : | : | : | acre | 1939 |
| | Hours | Hours | Hours | Pounds | Percent |
| Maine | 35 | 20 | 15 | 872 | |
| Vermont | 30 | 20 | 10 | 611 | |
| New England | 34 | 20 | 14 | 800 | |
| New York | 27 | 15 | 12 | 764 | |
| Michigan | 25 | 13 | 12 | 769 | |
| Wisconsin | 21 | 13 | 8 | 390 | |
| East North Central | 25 | 13 | 12 | 766 | |
| Minnesota | 20 | 13 | 7 | 325 | |
| Nebraska | 32 | 20 | 12 | 778 | 96 |
| Kansas | 20 | 13 | 7 | 2/ 375 | |
| West North Central | 30 | 19 | 11 | 599 | |
| Montana | 40 | 27 | 13 | 1,133 | 99 |
| Idaho | 35 | 21 | 14 | 1,301 | 78 |
| Wyoming | 35 | 23 | 12 | 1,056 | 90 |
| Colorado | 20 | 13 | 7 | 351 | 38 |
| New Mexico | 16 | 9 | 7 | 312 | 9 |
| Arizona | 20 | 11 | 9 | 468 | 23 |
| Utah | 25 | 15 | 10 | 3/ 600 | 55 |
| Mountain | 23 | 14 | 9 | 585 | |
| Washington | 25 | 12 | 13 | 3/ 1,200 | 38 |
| Oregon | 25 | 15 | 10 | 673 | 43 |
| California | 30 | 18 | 12 | 1,209 | 62 |
| Pacific | 30 | 18 | 12 | 1,206 | |
| United States | 25 | 15 | 10 | 780 | |

1/ Commercial producing areas. Includes, besides the ordinary edible beans, the blackeye of California and beans grown for seed. From 1.5 to 1 hour of man labor are usually required to harvest, thresh and haul 100 pounds of dry beans when the yield is 800 or more pounds per acre; when the yield is 300 to 300 pounds per acre, from 2 to 1.5 man hours per 100 pounds are usually required.

2/ Short-time average.

3/ 1941.

BROOMCORN: Labor requirements per acre 1/

| State | Man hours per acre | | | 1929-38 |
|--------------------|--------------------|---------|---------|----------|
| | | | | average |
| | | Pre- | | yield |
| | Total | harvest | Harvest | per acre |
| | Hours | Hours | Hours | Pounds |
| Illinois | 36.0 | 8.0 | 28.0 | 492 |
| Kansas | 20.0 | 4.0 | 16.0 | 194 |
| Oklahoma | 30.0 | 10.0 | 20.0 | 235 |
| Texas | 30.0 | 8.5 | 21.5 | 296 |
| West South Central | 30.0 | 9.7 | 20.3 | 249 |
| Colorado | 20.0 | 4.0 | 16.0 | 189 |
| New Mexico | 25.0 | 5.0 | 20.0 | 232 |
| Mountain | 22.5 | 4.5 | 18.0 | 211 |
| United States | 27.0 | 7.0 | 20.0 | 256 |

1/ Commercial producing areas. Includes production, harvesting, and hauling baled brush to market. Colorado and New Mexico production is practically all grown on non-irrigated land.

HOPS: Labor requirements per acre 1/

| State | Man hours per acre | | | 1929-38 |
|---------------|--------------------|---------|---------|----------|
| | | | | average |
| | | Pre- | | yield |
| | Total | harvest | Harvest | per acre |
| | Hours | Hours | Hours | Pounds |
| Washington | 450 | 125 | 325 | 1,758 |
| Oregon | 425 | 125 | 300 | 953 |
| California | 440 | 140 | 300 | 1,583 |
| United States | 432 | 128 | 304 | 1,184 |

1/ Principal commercial areas. Time required to harvest hops depends on the yield and whether the picking is done by hand or with machines. About 670 hours are required to pick 8,000 pounds of green hops by hand, compared to 100 hours with a machine.

PEAS, DRY FIELD: Labor requirements per acre 1/

| State | Man hours per acre | | | 1929-38 |
|--------------------|--------------------|-------------|---------|----------|
| | | | | average |
| | | | | yield |
| | Total | Pre-harvest | Harvest | per acre |
| | Hours | Hours | Hours | Bushels |
| Michigan | 14.0 | 6.5 | 7.5 | 10.6 |
| Wisconsin | 14.5 | 6.5 | 8.0 | 12.3 |
| East North Central | 14.2 | 6.5 | 7.7 | 11.5 |
| Montana | 6.7 | 3.2 | 3.5 | 16.1 |
| Idaho | 6.5 | 3.0 | 3.5 | 19.0 |
| Colorado | 6.0 | 3.0 | 3.0 | 9.0 |
| Mountain | 6.4 | 3.0 | 3.4 | 15.8 |
| Washington | 6.5 | 3.0 | 3.5 | 18.0 |
| Oregon | 6.5 | 3.0 | 3.5 | 17.2 |
| Pacific | 6.5 | 3.0 | 3.5 | 18.0 |
| United States | 7.0 | 3.2 | 3.8 | 16.0 |

1/ Commercial producing areas. Includes dry edible and seed peas grown commercially in material quantities. Cowpeas and Austrian winter peas are not included.

2/ Short-time average.

POPCORN: Labor requirements per acre 1/

| State | Man hours per acre | | | 1939 |
|--------------------|--------------------|-------------|---------|--------|
| | | | | yield |
| | | | | per |
| | Total | Pre-harvest | Harvest | acre |
| | Hours | Hours | Hours | Pounds |
| Ohio | 26 | 14 | 12 | 1,950 |
| Indiana | 24 | 12 | 12 | 1,925 |
| Illinois | 22 | 11 | 11 | 1,960 |
| Michigan | 27 | 15 | 12 | 1,540 |
| East North Central | 24 | 13 | 11 | 1,886 |
| Iowa | 20 | 10 | 10 | 1,560 |
| Nebraska | 16 | 8 | 8 | 720 |
| Kansas | 15 | 8 | 7 | 490 |
| West North Central | 19 | 10 | 9 | 1,373 |
| Kentucky | 34 | 20 | 14 | 1,000 |
| California | 30 | 14 | 16 | 1,100 |
| United States | 22 | 11 | 11 | 1,574 |

1/ Commercial producing areas. Ear corn of 70 pounds to bushel.

TOBACCO: Labor requirements per acre, by class 1/

| State | Man hours per acre | | | 1930-39 |
|-------------------------|--------------------|-------|---------|----------|
| | | | | average |
| | | | | yield |
| | Total | Pre- | Harvest | per acre |
| | Hours | Hours | Hours | Pounds |
| AIR-CURED (LIGHT) | | | | |
| Maryland | 290 | 150 | 140 | 723 |
| Virginia | 340 | 150 | 190 | 1,027 |
| West Virginia | 300 | 190 | 110 | 677 |
| North Carolina | 330 | 170 | 160 | 862 |
| Kentucky | 300 | 148 | 152 | 788 |
| Tennessee | 310 | 150 | 160 | 867 |
| Alabama | 325 | 180 | 145 | 2/ 650 |
| Ohio | 330 | 160 | 170 | 819 |
| Indiana | 325 | 160 | 165 | 801 |
| Missouri | 340 | 160 | 180 | 893 |
| Kansas | 330 | 160 | 170 | 2/ 834 |
| Total air-cured (light) | 304 | 150 | 154 | 802 |
| AIR-CURED (DARK) | | | | |
| Virginia | 300 | 150 | 150 | 752 |
| Kentucky | 300 | 140 | 160 | 827 |
| Tennessee | 300 | 140 | 160 | 802 |
| Indiana | 310 | 150 | 160 | 836 |
| Total air-cured (dark) | 300 | 141 | 159 | 820 |
| FLUE-CURED | | | | |
| Virginia | 420 | 170 | 250 | 692 |
| North Carolina | 455 | 170 | 285 | 810 |
| South Carolina | 470 | 175 | 295 | 836 |
| Georgia | 465 | 175 | 290 | 828 |
| Florida | 450 | 175 | 275 | 786 |
| Alabama | 425 | 175 | 250 | 700 |
| Total flue-cured | 454 | 171 | 283 | 802 |
| FIRE-CURED | | | | |
| Virginia | 320 | 155 | 165 | 765 |
| Kentucky | 325 | 140 | 185 | 776 |
| Tennessee | 315 | 140 | 175 | 826 |
| Total fire-cured | 320 | 143 | 177 | 794 |

- Continued -

TOBACCO: Labor requirements per acre, by class 1/- Continued

| State | Man hours per acre | | | 1930-39 |
|---------------------|--------------------|-------------|---------|------------------------|
| | Total | Pre-harvest | Harvest | average yield per acre |
| | Hours | Hours | Hours | Pounds |
| CIGAR BINDER | | | | |
| Massachusetts | 340 | 110 | 230 | 1,543 |
| Connecticut | 340 | 110 | 230 | 1,543 |
| New York | 290 | 100 | 190 | 1,258 |
| Pennsylvania | 310 | 100 | 210 | 1,392 |
| Wisconsin | 290 | 90 | 200 | 1,340 |
| Minnesota | 260 | 90 | 170 | 1,125 |
| Total cigar binder | 309 | 98 | 211 | 1,394 |
| CIGAR WRAPPER | | | | |
| Massachusetts | 500 | 275 | 225 | 1,000 |
| Connecticut | 500 | 275 | 225 | 979 |
| Georgia | 600 | 325 | 275 | 1,004 |
| Florida | 600 | 325 | 275 | 978 |
| Total cigar wrapper | 529 | 290 | 239 | 983 |
| CIGAR FILLER | | | | |
| Pennsylvania | 310 | 110 | 200 | 1,240 |
| Ohio | 260 | 110 | 150 | 984 |
| Georgia | 300 | 150 | 150 | 992 |
| Florida | 310 | 150 | 160 | 1,022 |
| Total cigar filler | 293 | 111 | 182 | 1,133 |
| ALL CLASSES | | | | |
| Massachusetts | 373 | 144 | 229 | 1,432 |
| Connecticut | 399 | 171 | 228 | 1,366 |
| New England | 392 | 164 | 228 | 1,383 |
| New York | 290 | 100 | 190 | 1,258 |
| Pennsylvania | 310 | 110 | 200 | 1,241 |
| Middle Atlantic | 309 | 109 | 200 | 1,242 |
| Ohio | 294 | 134 | 160 | 915 |
| Indiana | 324 | 160 | 164 | 806 |
| Wisconsin | 290 | 90 | 200 | 1,339 |
| East North Central | 299 | 125 | 174 | 1,031 |

- Continued -

TOBACCO: Labor requirements per acre, by class 1/ - Continued

| State | Man hours per acre | | | | 1930-39 |
|--------------------|--------------------|-------------|---------|--|----------|
| | | | | | average |
| | | | | | yield |
| | Total | Pre-harvest | Harvest | | per acre |
| | Hours | Hours | Hours | | Pounds |
| ALL CLASSES | | | | | |
| Minnesota | 260 | 90 | 170 | | 1,125 |
| Missouri | 340 | 160 | 180 | | 893 |
| Kansas | 330 | 160 | 170 | | 834 |
| West North Central | 332 | 154 | 178 | | 916 |
| Maryland | 290 | 150 | 140 | | 723 |
| Virginia | 399 | 166 | 233 | | 732 |
| West Virginia | 300 | 190 | 110 | | 677 |
| North Carolina | 454 | 170 | 284 | | 811 |
| South Carolina | 470 | 175 | 295 | | 836 |
| Georgia | 465 | 176 | 289 | | 831 |
| Florida | 457 | 186 | 271 | | 847 |
| South Atlantic | 444 | 170 | 274 | | 801 |
| Kentucky | 302 | 146 | 156 | | 792 |
| Tennessee | 312 | 146 | 166 | | 848 |
| Alabama | 392 | 177 | 215 | | 680 |
| East South Central | 305 | 146 | 159 | | 806 |
| United States | 402 | 162 | 240 | | 832 |

1/ Included in the total hours are those for raising plants, cutting and hauling curing wood, and for curing, preparing, and hauling the crop to market.

2/ Short-time average.

BEEF CATTLE: Labor requirements 1/

| State | Man hours | | | | | Beef | Other | Beef |
|-----------|-----------|-----------|-----------|-------------|-------------|-----------|-----------|-----------|
| | : Feeder: | : Beef | : Beef | : cows | : cattle: | : produc- | : produc- | : produc- |
| | : Beef | : cattle: | : Other | : produc- | : produc- | : on | : on | : tion |
| | : cows | : per | : cattle: | : tion | : tion | : farms: | : farms: | : in |
| | : per | : head | : per | : per cwt.: | : per cwt.: | : Jan. 1, | : Jan. 1, | : 1941 |
| | : head | : for | : head | : 2/ | : 3/ | : 1941 | : 1941 | : (live |
| | : per | : 4 | : per | : (live | : (dressed: | : 4/ | : 5/ | : weight) |
| | : year | : months: | : year | : weight): | : weight): | : | : | : |
| | : Hours | : Hours | : Hours | : Hours | : Hours | 1,000 | 1,000 | 1,000 |
| | : | : | : | : | : | head | head | pounds |
| Maine | : 50 | — | 25 | 7.3 | 12.6 | 5 | 91 | 34,395 |
| N. H. | : 50 | — | 25 | 6.7 | 11.5 | 1 | 45 | 17,570 |
| Vermont | : 50 | — | 25 | 5.7 | 9.8 | 2 | 142 | 64,505 |
| Mass. | : 50 | — | 25 | 5.5 | 9.5 | 1 | 55 | 26,090 |
| R. I. | : — | — | 25 | 4.8 | 8.3 | — | 6 | 3,120 |
| Conn. | : 50 | — | 25 | 5.2 | 9.0 | 1 | 49 | 24,455 |
| New Eng. | : 50 | — | 25 | 6.0 | 10.3 | 10 | 388 | 170,135 |
| New York | : 50 | — | 25 | 4.9 | 8.4 | 7 | 686 | 354,520 |
| N. J. | : 50 | — | 25 | 4.6 | 7.9 | 1 | 56 | 31,500 |
| Pa. | : 50 | — | 25 | 5.8 | 10.0 | 12 | 608 | 274,505 |
| Mid. At. | : 50 | — | 25 | 5.3 | 9.1 | 20 | 1,350 | 660,525 |
| Ohio | : 50 | 10 | 25 | 5.0 | 8.6 | 70 | 958 | 486,790 |
| Indiana | : 50 | 10 | 25 | 4.9 | 8.4 | 130 | 836 | 467,410 |
| Illinois | : 50 | 10 | 25 | 5.3 | 9.1 | 210 | 1,725 | 366,630 |
| Michigan | : 50 | — | 25 | 5.5 | 9.5 | 30 | 812 | 397,545 |
| Wisconsin | : 50 | — | 25 | 4.2 | 7.2 | 19 | 1,269 | 778,460 |
| E.N.Gen. | : 50 | 10 | 25 | 4.9 | 8.4 | 459 | 5,600 | 2,996,835 |
| Minnesota | : 50 | 10 | 25 | 5.2 | 9.0 | 106 | 1,715 | 806,175 |
| Iowa | : 50 | 10 | 25 | 5.3 | 9.1 | 484 | 3,193 | 1,645,395 |
| Missouri | : 50 | 10 | 25 | 6.6 | 11.4 | 476 | 1,407 | 849,045 |
| N. Dak. | : 25 | — | 12 | 3.3 | 5.7 | 140 | 742 | 374,905 |
| S. Dak. | : 25 | 10 | 12 | 3.8 | 6.6 | 310 | 950 | 492,120 |
| Nebraska | : 25 | 10 | 12 | 4.4 | 7.6 | 683 | 1,737 | 848,205 |
| Kansas | : 25 | 10 | 12 | 3.8 | 6.6 | 542 | 1,895 | 954,160 |
| W.N.Gen. | : 34 | 10 | 19 | 4.9 | 8.4 | 2,741 | 11,639 | 6,060,005 |
| Delaware | : 50 | — | 25 | 5.9 | 10.2 | 1 | 18 | 8,455 |
| Maryland | : 50 | — | 25 | 6.4 | 11.0 | 9 | 125 | 55,640 |
| Virginia | : 50 | — | 25 | 8.1 | 14.0 | 62 | 454 | 177,615 |
| W. Va. | : 50 | — | 25 | 8.0 | 13.8 | 49 | 301 | 124,020 |
| N. C. | : 50 | — | 25 | 8.4 | 14.5 | 23 | 237 | 87,225 |
| S. C. | : 40 | — | 20 | 7.0 | 12.1 | 23 | 145 | 54,200 |
| Georgia | : 20 | — | 12 | 7.1 | 12.2 | 138 | 463 | 116,870 |
| Florida | : 20 | — | 10 | 14.3 | 24.7 | 353 | 429 | 79,295 |
| So. At. | : 27 | — | 19 | 8.4 | 14.4 | 663 | 2,172 | 703,320 |

BEEF CATTLE: Labor requirements 1/ - Continued

| State | Man hours | | | | | Beef | Other | Beef |
|-------------|-----------|--------|--------|----------|----------|---------|---------|------------|
| | Feeder: | Beef | Beef | Beef | Beef | cows | cattle | produc- |
| | Beef | cattle | Other | produc- | produc- | on | on | tion |
| | cows | per | cattle | tion | tion | farms | farms | in |
| | per | head | per | per cwt. | per cwt. | Jan. 1, | Jan. 1, | 1941 |
| | head | for | head | 2/ | 3/ | 1941 | 1941 | (live |
| | per | 4 | per | (live | (dressed | 4/ | 5/ | weight) |
| | year | months | year | weight) | weight) | | | |
| | Hours | Hours | Hours | Hours | Hours | 1,000 | 1,000 | 1,000 |
| | | | | | | head | head | pounds |
| Kentucky | 50 | — | 25 | 7.0 | 12.1 | 87 | 590 | 271,950 |
| Tennessee | 50 | — | 25 | 7.5 | 12.9 | 104 | 574 | 261,555 |
| Alabama | 30 | — | 15 | 7.5 | 12.9 | 137 | 496 | 154,180 |
| Mississippi | 30 | — | 15 | 7.5 | 12.9 | 183 | 578 | 189,860 |
| E.S.Cen. | 37 | — | 20 | 7.3 | 12.6 | 511 | 2,238 | 877,545 |
| Arkansas | 30 | — | 15 | 5.9 | 10.2 | 137 | 583 | 219,095 |
| Louisiana | 20 | — | 10 | 6.9 | 11.9 | 324 | 557 | 174,975 |
| Oklahoma | 20 | — | 12 | 3.7 | 6.4 | 460 | 1,256 | 662,295 |
| Texas | 15 | — | 10 | 5.0 | 8.6 | 2,280 | 3,366 | 1,345,480 |
| W.S.Cen. | 17 | — | 11 | 4.9 | 8.4 | 3,201 | 5,762 | 2,401,845 |
| Montana | 15 | — | 10 | 3.9 | 6.7 | 454 | 658 | 343,545 |
| Idaho | 25 | — | 12 | 4.3 | 7.4 | 136 | 432 | 199,805 |
| Wyoming | 15 | 10 | 10 | 4.3 | 7.4 | 361 | 398 | 219,695 |
| Colorado | 15 | 10 | 10 | 3.8 | 6.6 | 469 | 736 | 380,245 |
| N. Mex. | 10 | — | 8 | 4.0 | 6.9 | 681 | 478 | 268,560 |
| Arizona | 10 | — | 8 | 4.3 | 7.4 | 441 | 423 | 183,440 |
| Utah | 15 | — | 10 | 3.6 | 6.2 | 117 | 232 | 112,230 |
| Nevada | 10 | — | 8 | 3.7 | 6.4 | 160 | 206 | 87,265 |
| Mountain | 13 | 10 | 10 | 4.0 | 6.9 | 2,819 | 3,568 | 1,794,785 |
| Washington | 25 | — | 20 | 5.2 | 9.0 | 89 | 398 | 195,470 |
| Oregon | 25 | — | 12 | 4.7 | 8.1 | 232 | 487 | 245,600 |
| California | 25 | — | 12 | 4.6 | 7.9 | 484 | 1,152 | 561,430 |
| Pacific | 25 | — | 14 | 4.9 | 8.5 | 805 | 2,037 | 1,002,500 |
| U. S. | 23 | 10 | 18 | 5.1 | 8.3 | 11,229 | 34,754 | 16,667,495 |

1/ Includes direct labor only for feeding, caring for, and disposing of the animals. Does not include labor for growing feed and for repairing barns and equipment.

2/ Total number of hours of man labor on all beef cattle divided by number of pounds of beef produced in 1941.

3/ Dressed weight assumed to average 58 percent of live weight.

4/ All cows 2 years old and over, minus cows 2 years old and over kept for milk.

5/ All cattle minus all cows 2 years old and over. "Other cattle" include calves, young heifers, and cattle grain fed in feedlot, or "feeder cattle". Figures are not available on the number of feeder cattle, but the number is relatively small and does not materially affect average hours per 100 pounds of beef produced.

CHICKENS AND EGGS: Labor requirements 1/

| State | Hours per head | Hours per 100 raised | Average weight per head of chickens sold on farms (live weight) | Number of hens of chickens in 1941 | Number of hens of chickens in 1941 | Number of hens of chickens in 1941 | Number of hens of chickens in 1941 | Number of hens of chickens in 1941 | |
|-----------|----------------|----------------------|---|------------------------------------|------------------------------------|------------------------------------|------------------------------------|------------------------------------|--------|
| | Hours | Hours | Pounds | Thou-sands | Thou-sands | Thou-sands | Thou-sands | Thou-sands | |
| Maine | 1.8 | .3 | 14 | 6.8 | 157 | 4.4 | 1,881 | 3,884 | 500 |
| N. H. | 1.8 | .3 | 15 | 7.1 | 144 | 4.2 | 1,634 | 3,218 | 1,000 |
| Vt. | 1.8 | .3 | 14 | 6.7 | 153 | 4.5 | 825 | 1,290 | 700 |
| Mass. | 1.8 | .3 | 14 | 6.8 | 153 | 4.4 | 3,849 | 7,744 | 1,800 |
| R.I. | 1.8 | .3 | 13 | 7.0 | 163 | 4.3 | 442 | 811 | 150 |
| Conn. | 1.8 | .3 | 16 | 7.0 | 138 | 4.3 | 2,661 | 4,307 | 6,800 |
| New Eng. | 1.8 | .3 | 15 | 6.8 | 149 | 4.4 | 11,292 | 21,254 | 10,950 |
| New York | 1.8 | .3 | 15 | 7.1 | 141 | 4.2 | 12,856 | 19,032 | 4,000 |
| N. J. | 1.8 | .3 | 16 | 7.5 | 139 | 4.0 | 5,997 | 9,819 | 1,300 |
| Pa. | 1.8 | .3 | 17 | 7.0 | 125 | 4.3 | 17,291 | 29,718 | 3,600 |
| Mid. At. | 1.8 | .3 | 16 | 7.1 | 133 | 4.2 | 36,144 | 58,569 | 8,900 |
| Ohio | 1.7 | .3 | 17 | 6.8 | 121 | 4.4 | 19,504 | 31,691 | 3,400 |
| Indiana | 1.7 | .3 | 17 | 7.0 | 116 | 4.3 | 13,250 | 29,707 | 4,600 |
| Illinois | 1.7 | .3 | 20 | 6.7 | 102 | 4.5 | 19,965 | 37,452 | 5,000 |
| Michigan | 1.9 | .3 | 20 | 6.8 | 115 | 4.4 | 11,573 | 18,926 | 500 |
| Wisconsin | 1.9 | .3 | 17 | 7.3 | 124 | 4.1 | 14,437 | 21,969 | 1,400 |
| E.N.Cen. | 1.8 | .3 | 19 | 6.8 | 115 | 4.4 | 78,729 | 139,745 | 14,900 |
| Minnesota | 1.9 | .3 | 20 | 7.1 | 113 | 4.2 | 19,737 | 36,938 | — |
| Iowa | 1.7 | .3 | 21 | 6.2 | 99 | 4.8 | 29,796 | 54,307 | — |
| Missouri | 1.7 | .3 | 19 | 7.5 | 106 | 4.0 | 20,543 | 36,444 | 2,250 |
| N. Dak. | 1.7 | .3 | 21 | 6.5 | 96 | 4.6 | 4,210 | 8,684 | — |
| S. Dak. | 1.7 | .3 | 21 | 6.5 | 94 | 4.6 | 7,018 | 14,591 | — |
| Nebraska | 1.7 | .3 | 19 | 7.5 | 106 | 4.0 | 11,909 | 28,950 | — |
| Kansas | 1.7 | .3 | 17 | 7.9 | 117 | 3.8 | 13,538 | 27,852 | 850 |
| W.N.Cen. | 1.7 | .3 | 19 | 7.0 | 106 | 4.3 | 106,751 | 207,766 | 3,100 |
| Delaware | 1.8 | .3 | 18 | 8.3 | 119 | 3.6 | 964 | 2,597 | 40,000 |
| Maryland | 1.7 | .3 | 18 | 7.7 | 112 | 3.9 | 3,309 | 7,521 | 14,000 |
| Virginia | 1.7 | .3 | 19 | 8.3 | 106 | 3.6 | 8,205 | 16,755 | 14,000 |
| W. Va. | 1.7 | .3 | 19 | 7.5 | 107 | 4.0 | 3,899 | 5,394 | 4,000 |
| N. C. | 1.7 | .3 | 24 | 8.1 | 86 | 3.7 | 8,349 | 19,729 | 6,160 |
| S. C. | 1.7 | .3 | 26 | 9.1 | 78 | 3.3 | 3,420 | 9,172 | 2,500 |
| Georgia | 1.7 | .3 | 26 | 9.1 | 78 | 3.3 | 6,550 | 15,594 | 6,000 |
| Florida | 1.7 | .3 | 22 | 9.4 | 91 | 3.2 | 2,135 | 4,847 | 3,500 |
| So. At. | 1.7 | .3 | 22 | 8.3 | 94 | 3.6 | 36,831 | 81,609 | 90,160 |

CHICKENS AND EGGS: Labor requirements 1/ - Continued

| State | Hours per head | | Hours per 100 pounds | | Average weight per head | Number of hens and pullets for egg production per year | Number of chickens raised for meat (6 mos.) | Number of chickens raised in 1941 | Number of commercial broilers produced in 1941 |
|------------|----------------|----------|----------------------|---------|-------------------------|--|---|-----------------------------------|--|
| | Hens | Chickens | dozen | of meat | | | | | |
| | and | raised | of eggs | 2/ | in 1941 | (live weight) | Jan. 1, 1941 | 3/ | 4/ |
| | | | | | | | | | |
| Kentucky | 1.7 | .3 | 21 | 7.7 | 95 | 3.9 | 9,429 | 22,198 | 1,000 |
| Tennessee | 1.7 | .3 | 23 | 7.3 | 89 | 4.1 | 9,104 | 15,726 | 1,800 |
| Alabama | 1.7 | .3 | 24 | 8.3 | 85 | 3.6 | 6,282 | 13,189 | — |
| Miss. | 1.7 | .3 | 28 | 8.8 | 73 | 3.4 | 6,390 | 14,165 | 1,185 |
| E.S.Cen. | 1.7 | .3 | 24 | 7.9 | 87 | 3.8 | 31,205 | 65,278 | 3,985 |
| Arkansas | 1.7 | .3 | 24 | 8.6 | 85 | 3.5 | 6,989 | 15,578 | 13,000 |
| Louisiana | 1.7 | .3 | 28 | 8.1 | 72 | 3.7 | 4,187 | 9,616 | 700 |
| Oklahoma | 1.5 | .3 | 17 | 7.9 | 108 | 3.8 | 10,241 | 19,833 | 2,000 |
| Texas | 1.5 | .3 | 18 | 8.3 | 100 | 3.6 | 24,238 | 40,759 | 7,000 |
| W.S.Cen. | 1.6 | .3 | 20 | 8.3 | 97 | 3.6 | 45,655 | 85,786 | 22,700 |
| Montana | 1.7 | .3 | 19 | 7.5 | 107 | 4.0 | 1,967 | 3,905 | — |
| Idaho | 1.8 | .3 | 20 | 7.7 | 110 | 3.9 | 2,230 | 4,303 | — |
| Wyoming | 1.8 | .3 | 20 | 7.9 | 106 | 3.8 | 746 | 1,578 | — |
| Colorado | 1.8 | .3 | 20 | 7.7 | 107 | 3.9 | 3,059 | 5,999 | — |
| N. Mex. | 1.8 | .3 | 22 | 7.7 | 100 | 3.9 | 1,079 | 1,297 | — |
| Arizona | 1.8 | .3 | 19 | 9.7 | 113 | 3.1 | 547 | 918 | 450 |
| Utah | 1.8 | .3 | 17 | 10.0 | 129 | 3.0 | 2,170 | 2,610 | — |
| Nevada | 1.8 | .3 | 17 | 10.0 | 129 | 3.0 | 240 | 416 | — |
| Mountain | 1.8 | .3 | 20 | 8.1 | 111 | 3.7 | 12,038 | 21,026 | 450 |
| Washington | 1.8 | .3 | 15 | 9.1 | 143 | 3.3 | 6,046 | 8,342 | 800 |
| Oregon | 1.8 | .3 | 16 | 7.7 | 136 | 3.9 | 3,228 | 4,875 | 350 |
| Calif. | 1.6 | .3 | 15 | 10.4 | 127 | 2.9 | 13,453 | 22,580 | 7,000 |
| Pacific | 1.7 | .3 | 15 | 9.7 | 133 | 3.1 | 22,727 | 35,797 | 8,150 |
| U. S. | 1.7 | .3 | 19 | 7.3 | 110 | 4.0 | 381,372 | 716,830 | 163,295 |

1/ Includes direct labor only for feeding poultry, and caring for and disposing of chickens and eggs. Does not include labor for growing feed and repairing buildings and equipment.

2/ Dressed weight assumed to average 70 percent of live weight.

3/ Does not include young chickens lost. "Chickens raised" includes chickens sold, used in household, inventory changes, and those lost during the year that were on hand January 1.

4/ Commercial broilers includes all young chickens of heavy breeds 2 to 4 pounds live weight, under 18 weeks old, raised for meat and not as a by-product in the production of pullets for egg production. Generally considered to require .25 hour to produce a broiler.

DAIRY COWS - MILK: Labor requirements 1/

| State | Man hours | | Milk | | Average: Cows and | |
|-----------------|-----------|-----------|---------|----------------|-------------------|---------------|
| | required | | per 100 | | number: heifers | |
| | Per | | pounds | | of milk: 2 years | |
| | head | of milk | per cow | Milk | cows on: | and over |
| | per | produced: | in 1941 | in 1941 | during: Jan.1, | on farms |
| | year | 2/ | 3/ | 3/ | 1941 | 1941 |
| | Hours | Hours | Pounds | Million pounds | Thousand head | Thousand head |
| Maine | 165 | 3.29 | 5,020 | 658 | 131 | 134 |
| New Hampshire | 165 | 3.29 | 5,020 | 361 | 72 | 75 |
| Vermont | 160 | 3.09 | 5,200 | 1,466 | 282 | 302 |
| Massachusetts | 165 | 2.71 | 6,080 | 821 | 135 | 141 |
| Rhode Island | 165 | 2.54 | 6,500 | 136 | 21 | 22 |
| Connecticut | 165 | 2.75 | 6,000 | 708 | 118 | 128 |
| New England | 163 | 2.98 | 5,468 | 4,150 | 759 | 802 |
| New York | 160 | 2.71 | 5,910 | 7,949 | 1,345 | 1,428 |
| New Jersey | 165 | 2.48 | 6,650 | 1,004 | 151 | 150 |
| Pennsylvania | 150 | 2.72 | 5,520 | 4,869 | 882 | 879 |
| Middle Atlantic | 157 | 2.70 | 5,812 | 13,822 | 2,378 | 2,457 |
| Ohio | 140 | 2.97 | 4,720 | 4,838 | 1,025 | 1,042 |
| Indiana | 140 | 3.10 | 4,520 | 3,435 | 760 | 769 |
| Illinois | 150 | 2.98 | 5,040 | 5,453 | 1,082 | 1,122 |
| Michigan | 150 | 2.74 | 5,480 | 5,124 | 935 | 969 |
| Wisconsin | 150 | 2.45 | 6,110 | 13,625 | 2,230 | 2,289 |
| E. N. Central | 147 | 2.73 | 5,384 | 32,475 | 6,032 | 6,191 |
| Minnesota | 145 | 2.74 | 5,300 | 8,824 | 1,665 | 1,756 |
| Iowa | 140 | 2.87 | 4,820 | 6,920 | 1,418 | 1,484 |
| Missouri | 130 | 3.39 | 3,830 | 3,631 | 948 | 963 |
| North Dakota | 130 | 2.91 | 4,470 | 2,262 | 506 | 562 |
| South Dakota | 130 | 3.39 | 3,830 | 1,827 | 477 | 519 |
| Nebraska | 140 | 3.14 | 4,460 | 2,752 | 617 | 626 |
| Kansas | 140 | 3.25 | 4,310 | 3,172 | 736 | 749 |
| W. N. Central | 138 | 2.99 | 4,616 | 29,388 | 6,367 | 6,659 |
| Delaware | 150 | 3.30 | 4,540 | 154 | 34 | 36 |
| Maryland | 150 | 3.09 | 4,850 | 960 | 198 | 204 |
| Virginia | 140 | 3.65 | 3,840 | 1,590 | 414 | 425 |
| West Virginia | 140 | 3.98 | 3,520 | 803 | 228 | 236 |
| North Carolina | 140 | 3.51 | 3,990 | 1,381 | 346 | 348 |
| South Carolina | 130 | 3.61 | 3,600 | 569 | 158 | 170 |
| Georgia | 125 | 3.86 | 3,240 | 1,076 | 332 | 362 |
| Florida | 120 | 3.64 | 3,300 | 343 | 104 | 120 |
| South Atlantic | 136 | 3.59 | 3,791 | 6,876 | 1,814 | 1,901 |

DAIRY COWS - MILK: Labor requirements 1/ - Continued

| State | : Man hours | | : Milk | | : Average : Cows and | |
|---------------|-------------|-------|---------------|-------------------|----------------------|------------------|
| | : required | | : produced: | | : number : heifers | |
| | : Per 100 | | : per cow : | | : of milk : 2 years | |
| | : head : | | : Milk | | : cows on : and over | |
| | : of milk : | | : production: | | : farms : on farms | |
| | : per : | | : in 1941 : | | : during : Jan. 1, | |
| | : year : | | : 2/ : 3/ : | | : 1941 : 1941 | |
| | Hours | Hours | Pounds | Million pounds | Thousand head | Thousand head |
| Kentucky | 130 | 3.53 | 3,680 | 1,995 | 542 | 566 |
| Tennessee | 130 | 3.70 | 3,510 | 1,941 | 553 | 581 |
| Alabama | 125 | 3.83 | 3,260 | 1,219 | 374 | 401 |
| Mississippi | 110 | 4.23 | 2,600 | 1,261 | 485 | 525 |
| E. S. Central | 124 | 3.78 | 3,284 | 6,416 | 1,954 | 2,073 |
| Arkansas | 120 | 3.75 | 3,200 | 1,453 | 454 | 486 |
| Louisiana | 100 | 4.44 | 2,250 | 644 | 286 | 335 |
| Oklahoma | 130 | 3.75 | 3,470 | 2,564 | 739 | 796 |
| Texas | 120 | 3.64 | 3,300 | 4,452 | 1,349 | 1,444 |
| W. S. Central | 120 | 3.73 | 3,221 | 9,113 | 2,828 | 3,061 |
| Montana | 140 | 2.94 | 4,760 | 733 | 154 | 162 |
| Idaho | 150 | 2.52 | 5,950 | 1,321 | 222 | 232 |
| Wyoming | 140 | 3.10 | 4,520 | 298 | 66 | 68 |
| Colorado | 140 | 2.89 | 4,850 | 1,067 | 220 | 237 |
| New Mexico | 130 | 3.13 | 4,150 | 299 | 72 | 79 |
| Arizona | 145 | 2.65 | 5,480 | 241 | 44 | 47 |
| Utah | 145 | 2.47 | 5,860 | 580 | 99 | 105 |
| Nevada | 145 | 2.51 | 5,770 | 115 | 20 | 21 |
| Mountain | 142 | 2.74 | 5,188 | 4,654 | 897 | 951 |
| Washington | 150 | 2.43 | 6,170 | 2,085 | 338 | 362 |
| Oregon | 145 | 2.54 | 5,710 | 1,428 | 250 | 265 |
| California | 155 | 2.25 | 6,880 | 5,091 | 740 | 756 |
| Pacific | 152 | 2.35 | 6,478 | 8,604 | 1,328 | 1,383 |
| United States | 140 | 2.95 | 4,742 | 115,498 | 24,357 | 25,478 |

1/ Includes direct labor only for feeding, milking, and caring for the cow herd, including calves born, and in caring for and disposing of the milk. Hours for growing the feed and for repairing buildings and equipment are not included. Heifer calves (under 2 years old) are included under other cattle in the "beef cattle" table.

2/ Hours required per 100 pounds of milk were obtained by dividing the hours required per head by the pounds of milk (expressed in 100 pounds) produced in 1941.

3/ Excludes milk sucked by calves and milk produced by cows not on farms.

GOATS AND MOHAIR: Labor requirements 1/

| State | Man | Number | Mohair |
|---------------|----------|-----------|-----------------|
| | hours | of goats | production |
| | per | clipped | in |
| | head | in | 1941 |
| | per year | 1941 | 2/ |
| | Hours | Thousands | Thousand pounds |
| Missouri | 6 | 80 | 192 |
| Texas | 7 | 3,850 | 3/ 18,750 |
| New Mexico | 7 | 226 | 1,130 |
| Arizona | 7 | 212 | 931 |
| Utah | 7 | 30 | 171 |
| Mountain | 7 | 463 | 2,232 |
| Oregon | 7 | 120 | 504 |
| California | 7 | 26 | 99 |
| Pacific | 7 | 146 | 603 |
| United States | 7 | 4,544 | 21,777 |

1/ Includes direct labor only for feeding and clipping, caring for the animals, and disposing of the mohair. Does not include labor for growing feed and repairing buildings, fences, and equipment. The hours per head do not apply to milk goats.

2/ In States where goats were clipped twice a year, figures include both spring and fall clip.

3/ In Texas kids are clipped in fall of year of birth. Figures include both goats and kids clipped.

HOGS: Labor requirements 1/

| State | : Man hours per 100 ; | | |
|--------------------|-----------------------|----------------|-----------------|
| | : pounds of pork : | | Pork |
| | : produced : | | production |
| | : Live : Dressed : | | in 1941 |
| | : weight : | : weight : | (live weight) |
| | | | Thousand |
| | : <u>Hours</u> | : <u>Hours</u> | : <u>pounds</u> |
| Maine | : 4.0 | 5.6 | 15,080 |
| New Hampshire | : 4.0 | 5.6 | 4,620 |
| Vermont | : 4.0 | 5.6 | 7,650 |
| Massachusetts | : 4.0 | 5.6 | 25,480 |
| Rhode Island | : 4.0 | 5.6 | 2,270 |
| Connecticut | : 4.0 | 5.6 | 6,150 |
| New England | : 4.0 | 5.6 | 61,250 |
| | : | | |
| | : | | |
| New York | : 4.0 | 5.6 | 65,640 |
| New Jersey | : 4.0 | 5.6 | 23,370 |
| Pennsylvania | : 4.0 | 5.6 | 179,175 |
| Middle Atlantic | : 4.0 | 5.6 | 268,185 |
| | : | | |
| | : | | |
| Ohio | : 2.8 | 3.9 | 1,050,727 |
| Indiana | : 2.8 | 3.9 | 1,455,404 |
| Illinois | : 2.8 | 3.9 | 1,952,100 |
| Michigan | : 3.5 | 4.9 | 314,094 |
| Wisconsin | : 3.5 | 4.9 | 722,402 |
| East North Central | : 2.9 | 4.0 | 5,494,727 |
| | : | | |
| | : | | |
| Minnesota | : 3.5 | 4.9 | 1,381,100 |
| Iowa | : 2.8 | 3.9 | 3,576,418 |
| Missouri | : 2.8 | 3.9 | 1,150,970 |
| North Dakota | : 3.5 | 4.9 | 201,043 |
| South Dakota | : 2.8 | 3.9 | 439,175 |
| Nebraska | : 2.8 | 3.9 | 653,605 |
| Kansas | : 2.8 | 3.9 | 436,504 |
| West North Central | : 2.9 | 4.0 | 7,838,815 |
| | : | | |
| | : | | |
| Delaware | : 4.0 | 5.6 | 7,426 |
| Maryland | : 4.0 | 5.6 | 63,610 |
| Virginia | : 4.0 | 5.6 | 191,403 |
| West Virginia | : 4.0 | 5.6 | 62,350 |
| North Carolina | : 4.0 | 5.6 | 230,230 |
| South Carolina | : 4.0 | 5.6 | 112,698 |
| Georgia | : 3.6 | 5.0 | 298,645 |
| Florida | : 4.0 | 5.6 | 99,625 |
| South Atlantic | : 3.9 | 5.4 | 1,065,987 |

- Continued -

HOGS: Labor requirements ^{1/} - Continued

| State | Man hours per 100 | | Pork production in 1941 (live weight) Thousand pounds |
|--------------------|-------------------|---------|--|
| | pounds of pork | | |
| | Live | Dressed | |
| | weight | weight | |
| | Hours | Hours | |
| Kentucky | 4.0 | 5.6 | 332,640 |
| Tennessee | 4.0 | 5.6 | 327,394 |
| Alabama | 3.6 | 5.0 | 183,255 |
| Mississippi | 4.0 | 5.6 | 148,155 |
| East South Central | 3.9 | 5.4 | 991,444 |
| Arkansas | 4.0 | 5.6 | 229,985 |
| Louisiana | 4.0 | 5.6 | 132,970 |
| Oklahoma | 4.0 | 5.6 | 291,528 |
| Texas | 4.0 | 5.6 | 453,973 |
| West South Central | 4.0 | 5.6 | 1,108,456 |
| Montana | 4.0 | 5.6 | 60,315 |
| Idaho | 4.0 | 5.6 | 117,570 |
| Wyoming | 4.0 | 5.6 | 20,330 |
| Colorado | 4.0 | 5.6 | 93,480 |
| New Mexico | 4.0 | 5.6 | 18,650 |
| Arizona | 4.0 | 5.6 | 11,490 |
| Utah | 4.0 | 5.6 | 29,550 |
| Nevada | 4.0 | 5.6 | 4,950 |
| Mountain | 4.0 | 5.6 | 356,835 |
| Washington | 4.0 | 5.6 | 82,450 |
| Oregon | 4.0 | 5.6 | 84,445 |
| California | 4.0 | 5.6 | 181,615 |
| Pacific | 4.0 | 5.6 | 348,510 |
| United States | 3.2 | 4.4 | 17,534,209 |

1/ Includes direct labor only for feeding, caring for, and disposing of the animals. Does not include labor for growing the feed, and repairing buildings, fences, and equipment. Dressed weight assumed to average 72 percent of live weight.

HORSES AND MULES: Labor requirements 1/

| State | Man hours per head: | | Work | |
|----------------|---------------------|-------|---------------|---------------|
| | per year | | horses | |
| | Work | | and | |
| | horses | Colts | mules | Colts |
| | and | 3/ | on farms | on farms |
| | mules | | January 1, | January 1, |
| | 2/ | | 1941 | 1941 |
| | Hours | Hours | Thousand head | Thousand head |
| Maine | 90 | 27 | 37 | 1 |
| New Hampshire | 90 | 27 | 14 | -- |
| Vermont | 90 | 27 | 40 | 2 |
| Massachusetts | 90 | 27 | 21 | -- |
| Rhode Island | 90 | 27 | 2 | -- |
| Connecticut | 90 | 27 | 18 | -- |
| New England | 90 | 27 | 132 | 3 |
| New York | 90 | 27 | 277 | 14 |
| New Jersey | 90 | 27 | 31 | 1 |
| Pennsylvania | 90 | 27 | 294 | 15 |
| Mid. Atlantic | 90 | 27 | 602 | 30 |
| Ohio | 70 | 21 | 409 | 44 |
| Indiana | 70 | 21 | 339 | 42 |
| Illinois | 70 | 21 | 536 | 66 |
| Michigan | 70 | 21 | 320 | 26 |
| Wisconsin | 60 | 18 | 460 | 45 |
| E. N. Central | 68 | 20 | 2,064 | 223 |
| Minnesota | 65 | 20 | 571 | 61 |
| Iowa | 60 | 18 | 676 | 96 |
| Missouri | 80 | 24 | 624 | 109 |
| North Dakota | 67 | 20 | 302 | 57 |
| South Dakota | 72 | 22 | 292 | 69 |
| Nebraska | 71 | 21 | 446 | 69 |
| Kansas | 62 | 19 | 371 | 67 |
| W. N. Central | 68 | 21 | 3,282 | 528 |
| Delaware | 90 | 18 | 20 | 2 |
| Maryland | 90 | 18 | 98 | 9 |
| Virginia | 90 | 18 | 239 | 20 |
| West Virginia | 90 | 18 | 100 | 10 |
| North Carolina | 90 | 18 | 367 | 9 |
| South Carolina | 90 | 18 | 200 | 3 |
| Georgia | 90 | 18 | 352 | 5 |
| Florida | 90 | 18 | 55 | 1 |
| So. Atlantic | 90 | 18 | 1,431 | 59 |

- Continued -

HORSES AND MULES: Labor requirements 1/ - Continued

| State | : Man hours per head | | : Work | |
|---------------|----------------------|----|--------------|-------|
| | : per year | | : horses | |
| | : Work | | : and | |
| | : horses | | : mules | |
| | : and | | : on farms | |
| | : mules | | : January 1, | |
| | : <u>2/</u> | | : 1941 | |
| | : <u>3/</u> | | : 1941 | |
| | : Hours | | : Thousand | |
| | : Hours | | : head | |
| | : head | | : head | |
| Kentucky | 80 | 16 | 418 | 48 |
| Tennessee | 90 | 18 | 422 | 44 |
| Alabama | 90 | 18 | 353 | 10 |
| Mississippi | 85 | 17 | 439 | 19 |
| E. S. Central | 86 | 17 | 1,632 | 121 |
| Arkansas | 77 | 15 | 398 | 43 |
| Louisiana | 79 | 16 | 312 | 21 |
| Oklahoma | 65 | 13 | 422 | 72 |
| Texas | 60 | 12 | 1,049 | 115 |
| W. S. Central | 66 | 13 | 2,131 | 251 |
| Montana | 54 | 11 | 205 | 52 |
| Idaho | 75 | 15 | 150 | 25 |
| Wyoming | 60 | 12 | 105 | 22 |
| Colorado | 65 | 13 | 191 | 35 |
| New Mexico | 39 | 8 | 118 | 18 |
| Arizona | 60 | 12 | 69 | 12 |
| Utah | 75 | 15 | 68 | 15 |
| Nevada | 50 | 10 | 31 | 7 |
| Mountain | 60 | 12 | 937 | 186 |
| Washington | 33 | 7 | 120 | 14 |
| Oregon | 61 | 12 | 126 | 16 |
| California | 82 | 16 | 178 | 20 |
| Pacific | 61 | 12 | 424 | 50 |
| United States | 73 | 18 | 12,635 | 1,451 |

1/ Includes direct labor only for feeding and caring for the animals. Does not include labor for growing feed and for repairing barns and equipment.

2/ Animals 2 years or more of age.

3/ Animals under 2 years old.

SHEEP: Labor requirements 1/

| State | Man hours per : Man : | | | | Production of : | | Sheep : Feeder | |
|----------------|-----------------------|--------------|-----------|----------|-----------------|-----------------|----------------|---------------|
| | Man : | 100 pounds : | hours : | hours : | Production of : | Sheep : | lamb and : | lamb and |
| | hours : | of sheep : | per : | per : | of sheep : | and : | lamb and : | lamb and |
| | per : | and lamb : | 100 : | 100 : | Sheep : | lamb : | on : | on farms |
| | head : | Live : | Dressed : | pounds : | and : | Wool : | on : | on farms |
| | per : | weight : | weight : | of : | lamb : | in : | farms : | Jan. 1, |
| | year : | 2/ : | 2/ : | wool : | in : | 1941 : | Jan. 1, | 1941 |
| | : | 2/ : | 2/ : | 2/ : | 1941 : | 1941 : | 1941 : | 3/ : |
| | Hours | Hours | Hours | Hours | Thousand pounds | Thousand pounds | Thousand head | Thousand head |
| Maine | : 6.0 | 8.7 | 17.1 | 52.1 | 1,415 | 236 | 41 | --- |
| New Hampshire | : 6.0 | 9.0 | 17.6 | 55.1 | 300 | 49 | 9 | --- |
| Vermont | : 6.0 | 9.6 | 18.8 | 50.8 | 655 | 124 | 21 | --- |
| Massachusetts | : 6.0 | 11.2 | 22.0 | 57.1 | 215 | 42 | 8 | --- |
| Rhode Island | : 6.0 | 4.0 | 7.8 | 50.0 | 150 | 12 | 2 | --- |
| Connecticut | : 6.0 | 10.7 | 21.0 | 62.5 | 140 | 24 | 5 | --- |
| New England | : 6.0 | 9.0 | 17.6 | 53.0 | 2,875 | 487 | 86 | --- |
| New York | : 6.0 | 6.5 | 12.7 | 47.2 | 14,560 | 2,002 | 306 | 54 |
| New Jersey | : 6.0 | 9.3 | 18.2 | 52.5 | 225 | 40 | 7 | --- |
| Pennsylvania | : 6.0 | 8.7 | 17.1 | 44.5 | 12,335 | 2,398 | 356 | --- |
| Mid. Atlantic | : 6.0 | 7.5 | 14.7 | 45.8 | 27,120 | 4,440 | 669 | 54 |
| Ohio | : 6.0 | 7.9 | 15.5 | 37.5 | 74,796 | 15,706 | 1,901 | 375 |
| Indiana | : 6.0 | 4.5 | 8.8 | 42.9 | 46,697 | 4,920 | 676 | 166 |
| Illinois | : 6.0 | 4.4 | 8.6 | 33.4 | 46,717 | 6,155 | 639 | 275 |
| Michigan | : 6.0 | 5.4 | 10.6 | 39.2 | 50,115 | 6,849 | 850 | 270 |
| Wisconsin | : 6.0 | 5.3 | 10.4 | 42.3 | 22,414 | 2,797 | 382 | 100 |
| E. N. Central | : 6.0 | 5.8 | 11.4 | 38.3 | 240,739 | 36,427 | 4,448 | 1,186 |
| Minnesota | : 6.0 | 4.5 | 8.8 | 40.7 | 78,714 | 8,769 | 1,133 | 335 |
| Iowa | : 6.0 | 4.3 | 8.4 | 39.4 | 101,452 | 10,967 | 1,341 | 617 |
| Missouri | : 6.0 | 5.1 | 10.0 | 43.9 | 90,997 | 10,621 | 1,525 | 170 |
| North Dakota | : 6.0 | 5.6 | 11.0 | 35.5 | 53,523 | 8,491 | 983 | 130 |
| South Dakota | : 7.0 | 6.9 | 13.5 | 43.2 | 94,618 | 15,019 | 1,816 | 278 |
| Nebraska | : 7.0 | 3.2 | 6.3 | 45.8 | 50,160 | 3,496 | 377 | 565 |
| Kansas | : 6.0 | 4.0 | 7.8 | 36.8 | 52,171 | 5,665 | 606 | 530 |
| W. N. Central | : 6.2 | 4.9 | 9.6 | 40.9 | 521,635 | 63,028 | 7,781 | 2,625 |
| Delaware | : 6.0 | 5.4 | 10.6 | 46.1 | 110 | 13 | 2 | --- |
| Maryland | : 6.0 | 5.5 | 10.8 | 53.8 | 3,330 | 340 | 61 | --- |
| Virginia | : 6.0 | 5.2 | 10.2 | 64.6 | 21,687 | 1,760 | 379 | --- |
| West Virginia | : 6.0 | 5.8 | 11.4 | 64.0 | 23,978 | 2,162 | 461 | --- |
| North Carolina | : 6.0 | 9.0 | 17.6 | 69.3 | 1,723 | 225 | 52 | --- |
| South Carolina | : 6.0 | 20.5 | 40.2 | 70.0 | 102 | 30 | 7 | --- |
| Georgia | : 6.0 | 14.6 | 28.6 | 81.4 | 391 | 70 | 19 | --- |
| Florida | : 6.0 | 22.5 | 44.1 | 107.0 | 347 | 73 | 26 | --- |
| So. Atlantic | : 6.0 | 5.8 | 11.4 | 64.6 | 51,668 | 4,673 | 1,007 | --- |

- Continued -

SHEEP: Labor requirements 1/ - Continued

| State | Man | hours | per | Man | hours | Production of | Sheep | Feeder |
|---------------|------|------------|---------|--------|-----------|---------------|---------|----------|
| | Man | 100 pounds | hours | hours | of sheep | per | and | lamps |
| | per | and | lamps | 100 | Sheep | Wool | on | sheep |
| | head | Live | Dressed | pounds | and | in | farms | on farms |
| | per | weight | weight | of | lamps | in | Jan. 1, | Jan. 1, |
| | year | 2/ | 2/ | wool | in | 1941 | 1941 | 1941 |
| | | | | | | | | |
| | 6.0 | 5.0 | 9.8 | 57.2 | 64,394 | 5,603 | 1,069 | ---- |
| Kentucky | 6.0 | 5.4 | 10.6 | 63.8 | 22,488 | 1,890 | 402 | ---- |
| Tennessee | 6.0 | 14.2 | 27.8 | 88.8 | 846 | 135 | 40 | ---- |
| Alabama | 6.0 | 16.6 | 32.5 | 104.3 | 1,160 | 184 | 64 | ---- |
| Mississippi | 6.0 | 5.3 | 10.4 | 60.5 | 88,888 | 7,812 | 1,575 | ---- |
| E. S. Central | 6.0 | 8.7 | 17.1 | 67.1 | 3,454 | 447 | 100 | ---- |
| Arkansas | 6.0 | 16.1 | 31.6 | 102.4 | 5,242 | 826 | 282 | ---- |
| Louisiana | 6.5 | 6.5 | 12.7 | 33.6 | 17,135 | 2,890 | 333 | 65 |
| Oklahoma | 6.0 | 12.3 | 24.1 | 36.2 | 235,945 | 80,250 | 9,656 | 175 |
| Texas | 6.0 | 12.0 | 23.5 | 37.1 | 261,776 | 84,413 | 10,371 | 240 |
| W. S. Central | 7.0 | 7.4 | 14.5 | 38.9 | 174,566 | 33,149 | 3,635 | 375 |
| Montana | 10.0 | 7.4 | 14.5 | 54.4 | 124,690 | 16,963 | 1,822 | 253 |
| Idaho | 6.5 | 7.6 | 14.9 | 35.0 | 152,905 | 33,379 | 3,548 | 290 |
| Wyoming | 6.3 | 5.1 | 10.0 | 43.1 | 115,538 | 13,561 | 1,717 | 865 |
| Colorado | 6.0 | 10.1 | 19.8 | 37.8 | 64,521 | 17,294 | 2,150 | 160 |
| New Mexico | 5.5 | 6.3 | 12.4 | 46.0 | 32,783 | 4,492 | 748 | 15 |
| Arizona | 5.0 | 6.3 | 12.4 | 29.6 | 95,127 | 20,106 | 2,352 | 153 |
| Utah | 5.0 | 7.2 | 14.1 | 32.3 | 26,492 | 5,893 | 755 | 30 |
| Nevada | 6.6 | 7.1 | 13.9 | 38.7 | 786,622 | 144,837 | 16,727 | 2,141 |
| Mountain | 6.5 | 5.3 | 10.4 | 33.8 | 36,997 | 5,778 | 595 | 44 |
| Washington | 6.3 | 6.2 | 12.2 | 36.7 | 82,955 | 14,058 | 1,626 | 70 |
| Oregon | 5.5 | 5.0 | 9.8 | 32.9 | 163,334 | 24,615 | 2,919 | 119 |
| California | 5.9 | 5.4 | 10.6 | 34.2 | 283,286 | 44,451 | 5,140 | 233 |
| Pacific | 6.2 | 6.7 | 13.1 | 39.0 | 2,264,609 | 390,568 | 47,804 | 6,479 |
| United States | | | | | | | | |

1/ Includes labor only for feeding, shearing, care of the flock, including lambs to weaning time, and disposal of products. Does not include labor for growing feed, and for repairing buildings, fences, and equipment.

2/ Dressed weight assumed to average 51 percent of live weight. Fifty percent of the total man hours were allocated to the production of meat from sheep and lambs, and 50 percent to wool.

3/ Lambs and sheep in the feedlot for 90 to 120 days generally require about 1 hour of man labor per head.

TURKEYS: Labor requirements 1/

| State | Man hours per head raised (8 mos.) | Man hours per 100 pounds Live- weight | Dressed weight | Average weight per head sold in 1941 | Number of turkeys raised in 1941 3/ | Number of turkeys on farms Jan. 1, 1941 |
|----------------|---|--|-------------------|---|--|---|
| | Hours | Hours | Hours | Pounds | Thousands | Thousands |
| Maine | 3.7 | 23.1 | 30.8 | 16.0 | 44 | 10 |
| New Hampshire | 3.7 | 23.6 | 31.5 | 15.7 | 65 | 10 |
| Vermont | 3.7 | 23.4 | 31.2 | 15.8 | 155 | 23 |
| Massachusetts | 3.7 | 23.6 | 31.5 | 15.7 | 224 | 46 |
| Rhode Island | 3.7 | 24.0 | 32.0 | 15.4 | 22 | 5 |
| Connecticut | 3.7 | 23.4 | 31.2 | 15.8 | 95 | 22 |
| New England | 3.7 | 23.6 | 31.5 | 15.7 | 605 | 116 |
| New York | 3.7 | 23.6 | 31.5 | 15.7 | 420 | 63 |
| New Jersey | 3.7 | 22.4 | 30.0 | 16.6 | 120 | 30 |
| Pennsylvania | 3.7 | 22.7 | 30.2 | 16.3 | 927 | 149 |
| Mid. Atlantic | 3.7 | 22.8 | 30.4 | 16.2 | 1,467 | 247 |
| Ohio | 6.0 | 33.7 | 51.6 | 15.5 | 815 | 118 |
| Indiana | 6.0 | 37.7 | 50.3 | 15.9 | 358 | 35 |
| Illinois | 6.0 | 39.5 | 52.7 | 15.2 | 630 | 110 |
| Michigan | 6.0 | 40.3 | 53.7 | 14.9 | 472 | 84 |
| Wisconsin | 6.0 | 38.5 | 51.3 | 15.6 | 462 | 99 |
| E. N. Central | 6.0 | 38.9 | 51.9 | 15.4 | 2,737 | 496 |
| Minnesota | 3.7 | 23.9 | 31.9 | 15.5 | 3,207 | 368 |
| Iowa | 3.7 | 22.3 | 30.4 | 16.2 | 1,782 | 282 |
| Missouri | 3.7 | 23.4 | 31.2 | 15.8 | 1,544 | 315 |
| North Dakota | 3.7 | 25.0 | 33.3 | 14.8 | 1,453 | 334 |
| South Dakota | 3.7 | 25.7 | 34.3 | 14.4 | 1,432 | 343 |
| Nebraska | 3.7 | 23.6 | 31.5 | 15.7 | 1,317 | 220 |
| Kansas | 3.7 | 24.5 | 32.7 | 15.1 | 1,157 | 236 |
| W. N. Central | 3.7 | 24.0 | 32.0 | 15.4 | 11,892 | 2,098 |
| Delaware | 3.7 | 23.4 | 31.2 | 15.8 | 121 | 25 |
| Maryland | 3.7 | 23.7 | 31.6 | 15.6 | 405 | 77 |
| Virginia | 5.7 | 37.3 | 49.7 | 15.3 | 805 | 161 |
| West Virginia | 5.7 | 40.4 | 53.9 | 14.1 | 225 | 50 |
| North Carolina | 5.7 | 38.2 | 50.9 | 14.9 | 239 | 56 |
| South Carolina | 5.7 | 36.3 | 48.4 | 15.7 | 142 | 62 |
| Georgia | 5.7 | 39.6 | 52.8 | 14.4 | 117 | 52 |
| Florida | 5.7 | 40.7 | 54.2 | 14.0 | 115 | 50 |
| So. Atlantic | 5.2 | 34.4 | 45.9 | 15.1 | 2,169 | 533 |

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TURKEYS: Labor requirements 1/ - Continued

| State | : Man | : | Man hours per | | : Average | : Number of | : Number of |
|---------------|------------|---|---------------|---------|-----------|-------------|-------------|
| | : hours | : | 100 pounds | | : weight | : turkeys | : turkeys |
| | : per | : | | | : per | : raised | : on farms |
| | : head | : | | | : head | : in | : Jan. 1, |
| | : raised | : | Live- | Dressed | sold in | 1941 | 1941 |
| | : (3 mos.) | : | weight | weight | 1941 | | |
| | : | : | : | : | : | 3/ | : |
| | : Hours | : | Hours | Hours | Pounds | Thousands | Thousands |
| Kentucky | : 5.7 | : | 37.3 | 49.7 | 15.3 | 310 | 88 |
| Tennessee | : 5.7 | : | 33.5 | 51.3 | 14.8 | 213 | 55 |
| Alabama | : 5.7 | : | 33.8 | 51.7 | 14.7 | 142 | 49 |
| Mississippi | : 5.7 | : | 33.3 | 51.7 | 14.7 | 139 | 55 |
| E. S. Central | : 5.7 | : | 38.0 | 50.7 | 15.0 | 304 | 247 |
| Arkansas | : 5.7 | : | 39.0 | 52.0 | 14.6 | 131 | 50 |
| Louisiana | : 5.7 | : | 39.0 | 52.0 | 14.6 | 66 | 36 |
| Oklahoma | : 3.5 | : | 24.0 | 32.0 | 14.6 | 1,275 | 329 |
| Texas | : 3.5 | : | 23.0 | 30.7 | 15.2 | 3,651 | 933 |
| W. S. Central | : 3.6 | : | 24.0 | 32.0 | 15.0 | 5,123 | 1,398 |
| Montana | : 3.3 | : | 21.6 | 28.8 | 15.3 | 276 | 55 |
| Idaho | : 3.3 | : | 21.4 | 28.5 | 15.4 | 248 | 43 |
| Wyoming | : 3.3 | : | 21.7 | 28.9 | 15.2 | 173 | 53 |
| Colorado | : 3.3 | : | 20.4 | 27.2 | 16.2 | 846 | 176 |
| New Mexico | : 3.3 | : | 22.3 | 29.7 | 14.8 | 52 | 23 |
| Arizona | : 3.3 | : | 20.1 | 26.8 | 16.4 | 61 | 17 |
| Utah | : 3.3 | : | 20.1 | 26.8 | 16.4 | 357 | 78 |
| Nevada | : 3.3 | : | 20.1 | 26.8 | 16.4 | 38 | 11 |
| Mountain | : 3.3 | : | 20.6 | 27.5 | 16.0 | 2,551 | 456 |
| Washington | : 3.0 | : | 16.0 | 21.3 | 18.3 | 996 | 176 |
| Oregon | : 3.0 | : | 16.5 | 22.0 | 18.2 | 1,726 | 340 |
| California | : 3.0 | : | 17.0 | 22.7 | 17.6 | 3,527 | 1,145 |
| Pacific | : 3.0 | : | 16.7 | 22.3 | 18.0 | 6,249 | 1,661 |
| United States | : 4.0 | : | 25.2 | 33.6 | 15.9 | 33,597 | 7,252 |

1/ Includes labor only for feeding, caring for, and disposing of the turkeys. Does not include labor for growing feed and for repairing buildings and equipment.

2/ Turkeys generally assumed to dress 70 to 75 percent.

3/ "Turkeys Raised" includes turkeys sold, and used in household, and inventory changes, and those lost during the year that were on hand January 1.